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Juvenile Gang Delinquency and Its Origin: Multifaceted Approach

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Abstract

Many Social factors are frequently used to explain juvenile delinquency and the emergence and persistence of juvenile gangs. Sociological theories, such as social control, containment, differential association, anomie, and labeling reflect different levels of predictive utility relative to delinquent conduct and are invoked to account for juvenile offending behavior. A survey of literature discloses that it is necessary to employ various sociological factors simultaneously to gain a better understanding of the cause of juvenile gang delinquency. Based on the findings of this research with the meticulous statistical analysis, thus, it is suggested that using a strategy from several theoretical explanations simultaneously to account for delinquent conduct and gang formation has greater predictive utility as opposed to using single-theoretical explanations.

Keywords: Juvenile Delinquency; Gang Delinquency; Social Factors; Sociological Theory.

1. Introduction

The United States has experienced rapid prevalence of gangs since 1980. During this period, the number of cities with gang problems increased from an estimated 286 jurisdictions with more than 2,000 gangs and nearly 100,000 gang members in 1980 (Miller, 1992) to about 3,100 jurisdictions with more than 31,000 gangs and approximately 850,000 gang members in 2012 (Egley, Howell, & Harris, 2014). Moreover, the prevalence of the gang delinquency in the U.S. has continued at the exceptional level in 2000s. It is measured by not only the number of gang memberships but also the number of crimes committed by gangs. For example, National Youth Gang Survey (NYGS) shows that approximately 35 percent of the jurisdictions experienced gang problems in 2009, compared with 25 percent in 2001 (National Gang Center, 2010), This fact is striking because it is contrary to an popular belief that gang-related violence by gangs would follow the overall dramatic drop in violent crime committed by other social groups nationally (Howell, 1999; Tita and Cohen, 2004; Tita and Griffiths, 2005; Tita and Ridgeway, 2007).

However, there is something that makes public more worry about this social problem. Several studies show that gang members were responsible for a large proportion of violent offenses, especially homicides. The number of gang-related homicides also increased 20 percent from 1,975 in 2007 to 2,363 in 2012. (Egley, Howell, & Harris, 2014). According to Thornberry (1998), gang members (30 percent of the sample) were responsible for committing 68 percent of all violent offenses. The use of firearms in assaults is considered as one of the direct causes of increasing these events resulting in lethal violence in contrast to nonlethal injury. Beginning in the 1980s, youth gangs were reported to have more weapons of greater lethality (Block and Block, 1993; Block, Christakos, Jacob et al., 1996; Decker, 2007).

The fact that gang delinquency became more prevalent and violent in American society has aroused scholarly interest in gang delinquency, and there has been any amount of research into this subject to find out what makes people get involved in gang-related activities in the early stages of their lives (Huff, 1989; Bernburg, Krohn, & Rivera, 2006; Eitle, Gunkel, &, Gundy, 2004; Venkatesh, 1997; Gordon et al., 2004, Hill et al., 1999; Decker, Melde, & Pyrooz, 2013; Densley, 2012), and various sociological perspectives are used to explain the emergence and persistence of gangs

Nevertheless, many previous studies have not comprehensively examined one's involvement in gang activities in his/her early adolescence even if understanding this social problem needs to look at various social risks collectively, including gang members' relationship with their family, friends and other significant members, their social status, and the role of school and community environment. And it is partially caused by the fact that many of those studies largely depended on a certain theoretical perspective to examine the impact of social risks on the involvement in gang activities, such as social control, containment, differential association, anomie, and labeling theory (Smapson & Groves, 1989; Singer, 1986; Broidy & Agnew, 1997; Pratt et al., 2010; Bernburg, Krohn, & Rivera, 2006; Winfree, Bäckström, & Mays, 1994).

So, it is a better way of utilizing a synthesized theoretical scheme to account for the interactional and multi-layered nature of gang formation because using a single theory cannot be a greater predictive utility as opposed to using various theories simultaneously. Based on this assumption, this paper aims 1) to examine why a certain group of people get involved in gang activities based on a holistic approach that is implemented by employing various theories collectively to explain the role of multitude of social risks on the involvement in gang delinquency; and 2) to find out how robust and reliable each theory in a synthesized theoretical scheme is to predict the probability of one's involvement in gang delinquency.

The following section will briefly introduce theories that are used in this research and previous studies that used and tested those theories to examine the etiology of gang affiliation.

2. Theoretical Explanation on Gang Delinquency

There has been pervasive theoretical approach to figure out the affiliation with delinquent activities. To my knowledge, however, few have previously developed a broad, comprehensive theory that dealt with gang activity. The closest approach to such a broad perspective on gangs was the work of the Chicago School of Sociology and the later work of Cloward and Ohlin (1960). Considering this theoretical limitation, thus, theoretical explanations that are used in this study are more likely to be based on the group of theories that examine the etiology of general criminal deviance in general, and those explanations are grouped into three major theories of social deviance: strain, subcultural, and control theory.

Strain theory explains that criminal deviance is driven in response to the frustration of experiencing or anticipating failure (Merton, 1938; Cohen, 1955; Cloward and Ohlin, 1960). The pressure to deviate from acceptable norms is created because there is a discrepancy between culturally induced aspirations and realistic expectations. In other words, people experience a struggle that can be lead to the affiliation with criminal activities when people internalize the goals of society in that legitimate avenues to success are blocked. Therefore, the frustrated, deprived, or strained individual violates society's rules to obtain the commodities that society has convinced him or her are important to obtain.

Similar to strain theory, subcultural theory is also concerned with factors that trigger and provoke delinquency, but Subcultural theory is different from Strain theory because it views meeting the demands of deviant associates rather than frustration of experiencing failures as the major factor that provoke delinquency (Cohen, 1955; Cloward and Ohlin, 1960; Miller, 1958; Sutherland and Cressey, 1974; Ageton & Elliott, 1974). Thus, subcultural theory argues that deviance is caused by adherence to the norms, expectations, or definitions of one's associates that is different from the norms, expectations, and definitions of the dominant society.

Whereas strain and subcultural theory are concerned with factors that motivate or provoke delinquency, control theory is concerned with factors that prevent deviance (Nye, 1958; Hirshi, 1969; Briar & Piliavin, 1965; Toby, 1957; Karacki & Toby, 1962; Polk & Halferty, 1966). Based on Control theory, it is assumed that people usually feel obliged to show some degree of commitment to conventional world. Hirshi (1969) argued that adolescents' behavior is less likely to be deviant when they are strong conventional bonds, such as affective ties to parents, success in school, involvement in school activities, high occupational and educational aspirations, and belief in the moral validity of conventional norms. Thus, the delinquent act is the result not of being drawn or driven but of being freed from constraints. These three major theories of deviance have been pervasively used and tested by many previous studies that focused on the adolescents' affiliation with delinquent activities, and the following section will briefly review those studies.

3. Literature Review on Gang Delinquency

Previous studies have discovered that there are various factors that are linked to adolescents' engagement in gang delinquency, and these risk factors that make a significant impact on an adolescent's life are typically categorized into five major areas: individual, family, school, peer, and community (Howell and Griffiths, 2016). The following discussion briefly explains how each factor in these areas is related with the cause of joining a gang delinquency.

Several family factors predict the etiology of gang joining, and some of them are related with certain types of family environments, such as low parent education, family poverty, low family socioeconomic status, pro-violence attitudes of a family, child maltreatment, and living with a gang member in a family (Larzelere & Patterson, 1990; Anderson, 2002; Curry & Spergel, 1992; Howell & Egley, 2005; Hsieh & Pugh, 1993). However, the most prominent family risk factor that is related with the cause of gang joining is relationships and interactions between family members, especially the attachment of children to their family. Several studies indicated that attachment to parents, defined as the adolescent's feelings, reduces delinquent behavior (Messner & Krohn, 1990; McCord, 1991; Elliott, Ageton, & Canter, 1979; Osgood & Anderson, 2004; Booth, Farrell, & Varano, 2008). Attachment to the family not only reduces delinquency directly, but it also can lessen exposure to delinquent peers and, therefore, decrease delinquency. Some studies suggested that adolescents who are attached to their parents an atmosphere of warmth and love, spend time with their parents, and are supported and supervised by their parents are less likely to have delinquent friends and are therefore less likely to commit gang-related delinquent acts (Poole & Regoli, 1979; Hill et al., 1999) because it enhances the level of parental control, monitoring, and management over their children (Agnew, 1991; Ellis, 1986; Larzelere & Patterson, 1990; Burt et al., 2006). Along with this risk factor, the parental rejection of their children or children's rejection of their parents is also positively related with adolescents' involvement in gang delinquency. (Simons, Robertson, & Downs, 1989; Wright & Wright, 1994). And, mutual rejection in that parents and children reject each other increases the possibility of adolescents' gang delinquency than the unilateral type of family rejection (Simons et al., 1989; Sampson, 1997)

School also makes a significant impact on gang membership. Many previous studies of risk factors for gang membership have examined students' relationship with their school measured by students' academic performance. The low achievement of children with poor-quality and unsafe schools increases the probability of being a gang member (Gottfredson, 2013; Thornberry et al., 2003). And, the majority of gang members perform poorly early in their academic life that lead them to have a low degree of commitment to school (Hill et al., 1999; Le Blanc and Lanctot, 1998). Furthermore, students' attitude toward school is also related with the school's role of reducing gang membership. Students who are less committed or attached to school are more likely to engage in gang-related activities than are students who are attached or committed to school (Howell & Egley, 2005; Jang, 1999; Jenkins; 1995; Murray & Greenberg, 2001; Catalano et al., 2004) because the lack of attachment and commitment to school is closely related with suspension and expulsions from school that makes students removed from adult supervision and exposed to association with delinquent peers, that can increase gang membership (Hemphill, Toumborou, Herrenkohl, et al., 2006; Esbensen and Huizinga, 1993; Hill et al., 1999; Thornberry et al., 2003). Students who feel vulnerable at school may seek protection in the gang, that leads them to join a gang (Gottfredson, 2013).

Association with peers who engage in gang delinquency is another major risk factor for gang membership. Especially, association with aggressive peers in the early adolescent years is a strong predictor of joining a gang (Thornberry et al., 2003; Craig et al., 2002; Lahey et al., 1999) because delinquent acts are often committed by adolescents in groups who are more peer-oriented than other adolescents are. (Agnew, 1985) and who protect each other more from potential attackers than other adolescents are (Schreck, Fisher, & Miller, 2004). The effect of delinquent friends on gang joining is enhanced if adolescents are attached to these friends, spend much time with these friends, feel that these friends approve of delinquency, and perceive pressure from these friends to engage in delinquent deeds (Agnew 1991; Gordon et al., 2004; Esbensen & Huizinga, 1993; Battin et al., 1998). Further, rejection by prosocial peers is another major factor that drives adolescents to join gangs (Haviland and Nagin, 2005; Thornberry, et al., 2003; Parker & Asher, 1987).

Living in a certain community also predicts the probability of becoming gang members in early adolescence. Several community risk factors include high drug use, youth in trouble, feeling unsafe in the neighborhood due to the exposure to firearm at the high level (Hill et al., 1999; Hill, Lui, & Hawkins, 2001; Lizotte et al., 2000; Bingenheimer, Brennan, and Earls, 2005). Other important neighborhood risk factors include low neighborhood attachment and neighborhood disorganization in that neighborhoods may lack the necessary "collective efficacy" measured by the level of informal control and social cohesion among residents to ameliorate the negative effects of community disorganization and low neighborhood attachment (Morenoff, Sampson, and Raudenbush, 2001; Sampson, 1997).

One's social status is also closely related with the involvement his/her engaging in gang-related activities. Several studies showed a significant relationship between a person's socioeconomic status and gang-related delinquency during adolescent years (LaGrange and White, 1985; Tittle & Meier, 1990; Joseph, 1995). Mental health problems that are partially caused by experiencing life stressors, such as worries about the future also another important individual risk factor to pushes people to join a gang at the early adolescence stage (Hill et al., 1999; Eitle, Gunkel, and Gundy, 2004; Thornberry et al., 2003). Furthermore, adolescents who are involved in delinquency at an early age because of having deviant value system are at higher risk for gang membership than are other adolescents (Craig et al., 2002).

4. Research Questions

Considering the main purpose of this study and the result of reviewing previous studies, the list of research questions are generated to examine the causal relationship between those risk factors and adolescents' gang affiliation and to evaluate the reliability of three major theories of deviance in analyzing and predicting adolescents' gang delinquency. The following is the list of research questions used in this study:

1) Dose the probability of joining a gang increases as social disorganization of the neighborhood increase?

2) Dose blocked social and economic opportunity result in an increased probability of gang delinquency?

3) Dose having delinquency of friends increase individual's gang delinquency?

4) Dose strong attachments to and involvement in family, school and other conventional institutions reduce gang delinquency?

5) Are middle class adolescents disproportionately less involved than working class and lower-class youths in gang delinquency?

6) Dose personal delinquent value or attitude increases the possibility of being a gang?

5. Methodology

5.1. Sample and data

The sample for this study were taken from the nationally representative National Youth Survey (NYS) (Elliott, 1980) that NYS interviewed a national probability sample of 1,725 youth, aged 15-19 about events and behavior occurring in the previous calendar year. NYS provides data on the demographic and socioeconomic status of respondents; neighborhood problems; youth aspirations and expectations; perceived disapproval; attitude toward deviance; exposure and commitment to delinquent peers; interpersonal violence; and other variables relevant to the study of gang delinquency. The average participant was 13.87 years old, and the racial composition for the sample was 78.9% White, 15.1% Black, 4.4% Hispanic, 1.0% Asian, 0.5% American Indian, and 0.2%.

5.2. Measuring dependent and independent variables

5.2.1. Dependent variable

In this study, delinquent behavior in NYS data was used as dependent variable. However, NYS data is so comprehensive that there are all kinds of delinquent activities in which some of them are not directly related to typical gang behaviors. Thus, for satisfying the purpose of this research, I thought that it is necessary to choose variables, which are related to gang delinquency. Therefore, I used the research conducted by Huff (1998) which shows the differences between gang and non-gang activities and criminal behavior. According to Huff (1998), there is the significance difference between gang member and non-gang member activities in the following criminal activities: auto theft, theft (other), assault peers, mug people, burglary, guns in school, knives in school, drug use, drug sale, arson, robbery, fighting, drinking, and vandalism. These are the illegal activities in which gang members are significantly more involved than non-gang members are. Thus, I chose variables, which ask the involvement of those activities, in the delinquent behavior section in NYS data, and there were 25 variables I found out. All of them were interval level of variables that are questions of frequency of each delinquent behavior, and those 25 variables were combined into 1 variable cluster.

5.2.2. Independent variables

In this research, several independent variables were used to find out risk factors of gang delinquency. Furthermore, I added some demographic variables that are gender and race to examine evidences about general characteristics of adolescents' gang delinquency shown in many data.

Attachment to family

There were several variables that are for testing family attachment. Some were ordinal level variables and others were interval level ones. However, I used ordinal level variables because there were more variables in this level than interval level. I found out 8 variables, and I added up values of these variables to convert these ordinal variables into 1 interval level variable cluster so that I can use OLS regression. Thus, higher value on each variable means higher degree in family attachment.

Social class

There were 2 variables that make it possible to test respondents' social class. However, all respondents, in this data, are adolescents, so there were no ways for me to measure their social class without information of their families' social class, especially their breadwinner's social status which can be measured by person's education and

occupation. Fortunately, I found out these 2 variables regarding their families' social class in NYS data, so I recoded values of these variables into small scale, which is 0 through 2, and then I added up these 2 variables to create an interval variable cluster. Thus, higher value means higher social class.

Delinquent associate

There were 13 ordinal variables to ask each respondent about how many friends are involved in each delinquent behavior. To get a reliable independent variable cluster testing delinquent associate, I converted 5 values into 2 values that are 0 and 1. Consequently, I made dummy variables for each of 13 variables. And then, I counted cases with value "1" converted to the interval variable. Therefore, higher value on each case means more delinquent friends each respondent has.

Peer approval

I found out 11 variables in NYS data that can measure peer approval. All of them were ordinal level variables. Thus, I also made dummy variable for each variable, and then counted cases in which friends condone their committing some illegal activities. Thus, those variables were converged into an interval variable cluster which can measure peer approval. Thus, a higher value on each case indicates higher degree of peer approval on delinquent behavior.

Peer pressure

Like the measure of peer approval, in this case, I made these 5 ordinal variables dummy variables, and then counted each case in which a respondent is forced to be involved in illegal activities. Therefore, I could also make an interval level variable cluster to measure peer pressure, and value "1" on each case shows higher degree of peer pressure on illegal activities than value "0"

School attachment

There were many variables with which I could test school attachment, but I selected 5 ordinal level variables. I made the dummy variable for each variable, and then counted each case with value "1" so I made an interval variable cluster. Thus, it indicates that higher value on each case means higher degree of school attachment.

School performance

For measuring school performance, I just used an interval variable, which provides information on respondents' grade point, so higher value on this variable in each case shows higher grade point average.

Neighborhood problem

There were 8 ordinal variables that can be used for measuring neighborhood problem. First of all, I shrink 3 values into 2 values to make dummy variable, and then counted each respondent who think that there are some neighborhood problems in his or her community. Thus, it was converted to interval level in which value scale is 0 through 8. And finally, I converted these values into dummy variable, which is 0 for 0 and 1 for 1 through 8. Thus, value "1" means more neighborhood problem than value "1".

Future-oriented perceived strain

To measure this variable cluster, I chose variables that measure the respondents' aspiration and expectation of future occupation and education level. 4 variables were selected for this variable cluster. First of all, I recoded values of variables that measure aspiration of future career and education into small scale, and then added up these 2 variables, and finally average total from those variables. In the same way, I got the final numbers on variables of expectation, and then I subtracted values of "expectation" from "aspiration". And finally, I made dummy variable for each case in which 0 for 0 and 1 for rest of values, so it means that value "1" is higher level of strain than value '0".

Delinquent value

I found out 10 variables for measuring the variable of delinquent value. All of them were ordinal level variables, and then I converted values in 0 and 1 to make dummy variable for each case. Finally, I counted cases with value "1. Thus, higher value on each case means higher degree of favor on delinquent value.

6. Findings

Before presenting a table that shows the result of multiple regression, two preliminary tables are presented to describe the overall characteristics of risk factors. These descriptive statistics shows not only the mean and percentage of variables that describe each risk factor but also racial difference in those factors. First table contains the mean of interval level variables, and second one includes the percentage of values in categorical variables.

Overall, figures shown in Table 1 & 2 consistently reflect the findings of previous studies. First of all, Table 1 shows that Blacks and Hispanics are involved in more delinquent activities that are possibly caused by gang affiliation than white counterparts. This supports many previous studies that argued that African American and Hispanic are higher gang affiliation rate than whites. According to a survey by National Gang Center (2012), gang members consist of 46 percent Hispanic, 35 percent African-American, 43 percent, 11 percent white, and 8 percent other racial groups. Esbensen and Osgood (1997) also showed similar outcomes that in a survey of nearly 6,000 eighth graders in 11 cities, 31 percent of the students who said they were gang members were African American, 25 percent were Hispanic, 25 percent were white, 5 percent were Asian, and 15 percent were of other racial and ethnic groups.

Table 1. Racial difference on descriptive Statistics of Interval Variable Cluster

Variable / Race	White	Black and Hispanic
Delinquent Behavior	6.07	6.65
Social Class	2.43	1.41
Family Attachment	11.22	11.32
School Attachment	.29	.26
Delinquent Associates	4.07	4.84
Peer Approval	.69	.90
Delinquent Value	.69	1.13
Grade Average Point	3.72	3.59

Source: National Youth Survey (1981)

Note: Numbers in this table indicate mean of each variable cluster.

Social class also reflects the findings of many previous studies. The social class of white respondents is higher than the social class of black and Hispanic respondents. It means that white respondents in the data have family background in that educational level and occupational status are higher than that of Black and Hispanic respondents.

Table 2. Racial Difference on Descriptive Statistics of Categorical Variable Cluster

Variable / Race	White	Black and Hispanic
Gender		
Male	51.6	56.2
Female	48.4	43.8
Peer Pressure		
Yes	30.5	28.7
No	69.5	71.3
Future-Oriented strain		
Yes	42.7	56.1
No	57.3	43.9
Neighborhood Problem		

Yes	61.4	63.0
No	38.6	37.0

Source: National Youth Survey (1981)

Note: Numbers in this table indicate mean of each variable cluster.

In addition, school attachment and school performance are also consistent with the findings of some past research. Table 1 shows that white respondents have higher school attachment than Black and Hispanic respondents, and the GPA is also higher among white respondents than that of Blacks and Hispanics. Moreover, Black and Hispanic respondents have the higher mean value of delinquent associates, peer approval for delinquent behavior, and peer pressure to delinquent behavior that are supported by the findings of many previous studies that examined the impact of these risk factors on adolescents' affiliation with gang delinquency as well.

In addition, Black and Hispanic adolescents are more likely to have future-oriented strain, delinquent value, and neighborhood problem than white counterparts that is congruous the findings of many previous studies. As suggested by many prior studies, it is linked with the fact that Black or Hispanic youths are more likely to have an opportunity to have a tie with delinquent peers and having the situation in that opportunities are ceaselessly blocked.

Family attachment is little different from other variables in this table because the numbers are not congruous with from what many prior researches showed. However, some studies clearly indicated that Blacks and Hispanics are more likely to be attached than Whites are. For example, Giordano, Cernokovoch, and De Maris (1993), discovered that there is greater intimacy between Black and Hispanic youths and their families than that of Whites. Giordano et al. (1993) also claimed that Black youths might be less attached to their peers than whites, so there is less susceptible to peer pressure and less willing to protect peers among Black youths than white counterparts that is similar to the mean number shown in Table 2.

Until now, I have briefly described the characteristics of each variable cluster. From now, I will examine how closely each risk factor is related with dependent variable, delinquent behavior. I will begin with a table which comes from the multiple regression between delinquent behavior and 12 independent variables that represent the risk factors of adolescents' affiliation with gang delinquency.

As seen below, the result from multiple regression shows that there is a causal relationship between each independent variable and the dependent variable which is gang related delinquent behavior in some degree. In other words, some factors (independent variables) cause the gang related delinquency, but there are also factors (independent variables) which do have no impact on adolescents' gang delinquency. The following is the discussion of the result.

Model 1

As shown in Table 3, controlling for the rest of variables, male is engaged in more gang related delinquent activities than female by 2.70, and one' social class also makes an impact on his/her affiliation with gang delinquency in that an adolescent with higher social class is less engaged in gang delinquent activities. However, adolescents' race is not statistically linked with their delinquent behavior which means that there is no difference between whites and Blacks and Hispanics in the probability of gang affiliation. However, this model has significant R-Square which is .058. Thus, we can say that gender, race, and social class explain 5.8% of variation in adolescents' affiliation with gang delinquency, and the model is significantly fit to the data.

Model 2

In Model 2, the group of variables that are family attachment and school attachment are added to gender, race, and social class to see whether the model and existing coefficients have some changes from model 1. There are no significant changes found in Model 2 from Model 1. The variable of gender and social class is still statistically significant, but values of coefficient are bigger than those of coefficient in model 1. Thus, it suggests that gender and social class have more impact on an adolescent's affiliation with gang delinquency. Similar to Model 1, Model 2 shows that race makes no impact on gang affiliation. In addition, Model 2 also shows that family attachment and school attachment are both statistically significant with adolescents' delinquent behavior because of gang affiliation, so the more adolescents are attached to family and school, the less they are involved in gang related activities. Like Model 1, Model 2 also has significantly good fit to the data. R-Square for this model is .137, so gender, race, social class, family attachment, and school attachment to predict delinquent behavior yields a 13.7% reduction in the prediction errors, compared with using only the mean. In addition, Model 2 is significantly better fit than Model 1. In other words, family attachment and school attachment contribute to making stronger explanation

of various causal factors on an adolescent's gang affiliation measured by the level of delinquent behavior by 7.8% than only having gender, race, and social class.

Model 3

In Model 3, there are another group of variables are added: delinquent behavior, peer approval, and peer pressure. Despite adding these three variables, gender and social class are still statistically significant. In addition, like model 1 and 2, race is statistically significant, and it means that there is no meaning difference between white and non-white adolescents in terms of the degree of gang affiliation. However, there are significant changes in family attachment and school attachment. Family attachment is still positively related to delinquent behavior, but there is no significant relationship between school attachment and delinquent behavior. It may be partially caused by adding three new variable clusters to those existing variables in Model 3. All these three variables are positively related with delinquent behavior. Thus, it suggests that if adolescents have more delinquent friend, feel peer pressure on doing illegal acts, and have more approvals on illegal activities from their friends, they are more likely to be engaged in gang-related delinquent acts. Like previous two models, Model 3 also has significant R-Square which is .465, so it means that race, gender, social class, family and school attachment, and variables related friend' relationship explain 46.5% of variation in delinquent behavior In addition, this model has huge increase in R-Square Change which is also significant by .328, so it indicates that adding three new variables make Model 3 significantly better fit than Model 2.

Table 3. OLS Regression of Gang-Related Delinquent Behavior on Risk factors from Individual, Family, Peer, and Community

Independent variable	*Model 1*	*Model 2*	*Model 3*	*Model 4*	*Model 5*	*Model 6*	*Model 7*
Gender (male=1)	2.70[3]	2.72[3]	1.22[3]	1.21[3]	1.20[3]	1.28[3]	1.16[3]
	(.23)	(.23)	(.10)	(.10)	(.10)	(.11)	(.10)
Race (non-white=1)	.22	.29	.29	.35	.33	.47	.48
	(.02)	(.02)	(.02)	(.02)	(.02)	(.03)	(.03)
Social Class	-.34[1]	-.41[2]	-.28[2]	-.26[1]	-.26[1]	-.27[1]	-.34[2]
	(-.08)	(-.09)	(-.07)	(-.06)	(-.06)	(-.06)	(-.08)
Family Attachment		-.56[3]	-.16[1]	-.16[1]	-.15[1]	-8.2E-02	-6.2E-02
		(-.22)	(-.06)	(-.06)	(-.06)	(-.03)	(-.02)
School Attachment		-1.07[3]	-.44	-.45	-.44	-.46[1]	-.37
		(-.12)	(-.05)	(-.05)	(-.05)	(-.05)	(-.04)
Delinquent Associates			.93[3]	.94[3]	.94[3]	.77[3]	.76[3]
			(.52)	(.52)	(.52)	(.43)	(.42)
Peer Approval			.61[3]	.61[3]	.59[3]	.47[3]	.45[3]
			(.16)	(.16)	(.15)	(.12)	(.12)
Peer Pressure (yes=1)			.70[1]	.70[1]	.65[1]	.70[1]	.74[1]
			(.06)	(.06)	(.05)	(.06)	(.06)
Future Strain (yes=1)				.51	.51	.42	.54
				(.04)	(.04)	(.04)	(.05)
Community Prob (yes=1)					.65[1]	.74[1]	.75[3]
					(.05)	(.06)	(.06)
Delinquent Value						.74[3]	.72[3]
						(.20)	.20)
Grade Average Point							-.63[3]
							(-.09)

Constant	5.23[3]	11.10[3]	2.15[1]	2.40[1]	1.88	1.06	3.24[2]
R²	.058[3]	.137[3]	.465[3]	.467[3]	.469[3]	.496[3]	.502[3]
R²Change		.078[3]	.328[3]	.002	.002[1]	.027[3]	. 007[3]

Source: National Youth Survey (1981)

Note: N = 1,725; the number in parentheses is standardized coefficient.

[1]$p < .05$; [2]$p < .01$; [3]$p < .001$ (two-sample tests).

Model 4

In Model 4, a variable cluster, future-oriented strain is added to other variables. This variable is dummy variable, so if respondents feel strain, they are coded into "1", otherwise they are coded into "0". In this model, however, there is no difference between adolescents who feel strain and who do not feel it in the probability of committing gang-related delinquent acts despite the positive coefficient of this variable cluster. Moreover, there are no notable changes in Model 4. Coefficient values and p-values are almost identical between Model 3 and 4. In addition, adding future-oriented strain does not make this model significantly better fit than model 3. However, there is still significant on R-Square, so it means that Model 4 is significantly good fit to the data, that is, independent variables in this model explain 46.7 % of variation in delinquent behavior.

Model 5

In Model 5, neighborhood problem is added to those existing variables. This variable cluster provides information regarding how respondents evaluate their community, and how this personal evaluation causes them to make a decision to affiliate with a gang. This model shows that the more problems adolescents think that their communities have, the more they are likely to be involved in gang-related delinquent activities controlling for other variables. However, adding this variable cluster does not make remarkable changes on other existing variables' having significant relationship with a respondent's engagement in delinquent activities. However, adding community problem make Model 5 significantly better fit to data than Model 4. Even if the change of R-Square is .002, it is still significant within .05 significant level, so it indicates that these significant two R-square have significantly different from "0".

Model 6

Another variable, delinquent value, is added in Model 6. This variable cluster shows the degree of adolescents' attitude or value on delinquent activities, so it suggests that the more delinquent value adolescents have, the more they are likely to affiliate with gang-related activities. Adding this variable cluster made some changes in Model 6. First of all, family attachment is no longer risk factor of delinquent behavior. In other words, having an intimate relationship with their families is not a meaningful indicator of predicting adolescents' gang affiliation. Moreover, the value of unstandardized coefficient also indicates that even if family attachment was linked with delinquent behavior, there would be no significant difference between adolescents who have an intimate family relationship and who have not such an intimate relationship with their families. However, school attachment is statistically significant in Model 6 which means that there is a relationship between how much adolescents are attached to their schools and how possibly they are likely to be engaged in gang related activities. R-Square for this model is .496 within .001 statistical level, so the group of independent variables in Model 6 explains about 50% of variation in adolescents' affiliation with gang related activities. Moreover, there is significant increase of R-Square in this model compared to model 5, so it means that adding delinquent value helps the model 6 to be significantly better fit to the data than Model 5.

Model 7

In Model 7, all the independent variables are included to see the impact of each variable on causing adolescents' to be engaged in gang delinquency. In Model 7, the respondents' grade average point (GPA) is added to examine if school performance is the risk factor on adolescents' gang affiliation, and Model 7 shows that a high GPA possibly makes adolescents less involved in gang related activities. There are no major changes in Model 7 from Model 6 except school attachment that does not have a statistical relationship with delinquent behavior in Model 7. This result is same as Model 2,3, and 4. Thus, in Model 7 which is complete model for this research, social class, delinquent associates, peer approval, peer pressure, community problem, delinquent value, and GPA have a significant relationship with adolescents' affiliating with gang related behavior, so it implies that these variable clusters play some roles on adolescents' gang delinquency. On the other hand, family and school attachment, and future-oriented strain do not have a significant relationship with delinquent behavior, so it suggests that these

variable clusters may not be the risk factors of adolescents' engaging in gang-related delinquency. Model 7 is also significantly good fit to the data. All the independent variable clusters I used in this research explain 50.2% of variation in dependent variable, adolescents' delinquent behavior. Moreover, model 7 is significantly better fit to the data than model 6 is by .007.

7. Discussion

As shown above, some independent variables can be considered as factors that cause adolescents to affiliate with gang-related activities. Among these variables, delinquent associates and delinquent value have strong causal relationships with dependent variable, and the rest of them seem to have moderate relationships with dependent variable. However, four variables that are race, family attachment, school attachment, and future-oriented strain, do not have causal relationship with delinquent behavior that is different from the majority of previous research.

What causes this to happen? Is it caused by some measurement errors of this research? Or are there some intervening variables between these variables and dependent variable? Therefore, I will examine the causes of these variables' no relationship with dependent variable.

First of all, although many studies have shown that Black and Hispanic adolescents are more involved in gang-related activities than white counterparts (Curry et al., 1996; Esbensen & Osgood, 1997), this research shows no difference between white and non-white adolescent. It is partially caused by the racial composition of the sample that consists overwhelmingly of white adolescents, so it would be possible to find out as many white respondents in this data who have been involved in gang related activities as Black or Hispanic counterparts. Moreover, as shown on Table 1 and 2, there is no notable difference between whites and non-whites in the values of most of interval and categorical variables, and multiple regression shown in Table 3 may not show the significant racial difference in the probability of affiliating gang related activities. In other words, causal relationship between the group of risk factors and delinquent behavior shown in Table 3 is based on multiple regression that measures how each risk factor influence adolescents to gang affiliation collectively, so it is assumed that some variables mediate the relationship between race and gang related delinquency.

Next, family attachment is statistically linked with delinquent behavior controlling for the rest of variable until the variable, delinquent value, are added in Model 6, and it suggests that there are some intervening variables between family attachment and delinquent behavior. In this case, delinquent value can mediate the causal relationship between family attachment and delinquent behavior. In other words, if the hypothesized causal chain is correct, a bivariate association exists between family attachment and delinquent behavior, but the bivariate association disappears when delinquent value mediates the bivariate relationship between family attachment and adolescents' gang related activities. The impact of deviant value on changing this bivariate association can be explained by subcultural theory predicts that an affective tie to a deviant parent would lead to the child's adoption of the parent's nonconventional behavior patterns. School attachment also has this kind of "chain relationship." In this case, school attachment has significant relationship with delinquent behavior until the group of variables, delinquent associates, peer approval, and peer pressure, are added in Model 3. Thus, these three variables are "intervening variables," that mediates the impact of school attachment on adolescents' affiliating with gang related activities.

Finally, I will mention the cause of no relationship between strain and delinquent behavior. This variable is not significantly linked to dependent variable in every model shown in Table 3. And, it is related with measurement error in this research in that only 4 variables were used to measure each respondent's future-oriented strain. Thus, it is advisable to have more variables that are added into existing variables to make the variable, future strain, more valid.

The causal relationships between the group of independent variables and a dependent shown in this research have some important implications for the reliability of the major theories of deviance on predicting adolescents' gang affiliation under a certain risk factor. The following discussion presents some of the important points regarding the implications for the theories of deviance.

Family

As shown in Table 3, family attachment is not statistically related with delinquent behavior, and this finding is contradictory to major theoretical explanations that predict the strong causal relationship between family attachment and adolescents' gang affiliation. The impact of family relationship on adolescents' gang affiliation is largely explained by control theory. Control theory predicts that the attachment between parents and their children will be one of the major social connections to prevent delinquency, and many research findings have supported this hypothesis. Hirshi (1969) finds a significant statistical relationship between the increase in the level of delinquent behavior and each of the following risk factors: lack of parental communication and sympathy, laxity of parental supervision, and absence of adult role models. Nye (1958) also argues that various kinds of positive attachments to parents make adolescents less likely to involve in delinquent acts. Therefore, this research finding casts little doubt

on the reliability of control theory. However, it also shows that the impact of intervening variable, delinquent variable, on the bivariate relationship between family attachment and delinquent behavior that mediates the causal relationship between family attachment and delinquent behavior. Thus, it suggests that living in a disruptive family environment can increase the likelihood of adolescents' gang affiliation.

Friends

Table 3 shows that the group of variables that suggest the role of friend on adolescents' possible involvement in delinquency, such as gang affiliation. The findings show that there is positive relationship between delinquent associates and delinquent behavior, so it means that the stronger adolescents' relationship with their delinquent friends is, the more they are likely to be involved in gang delinquency because of the high level of peer pressure and peer approval that dominate those relationships. Similar to other studies, this research finding strongly support subcultural theory that places the highest emphasis on the influence of group pressures in generating delinquency. Several studies (Cohen, 1955; Cloward & Ohlin, 1960; Sutherland & Cressy, 1974) suggest that adolescents who are socialized within cohesive delinquent groups are more likely to hold attitudes and values conductive to anti-legal behavior because adolescents are so concerned about belonging to a group that it propels them into committing delinquent activities to gain peer approval (Miller, 1958).

However, other major theories of deviance accord little importance to the role of delinquent associates on causing affiliating with gang delinquency. For example, Hirshi (1969) underestimated the causal influence of delinquent associates.

School

Table 3 shows that there is no causal relationship between school attachment and delinquent behavior. School performance, on the other hand, is statistically linked with adolescents' delinquent behavior. Those three major theories of deviance assign some relevance to the role of the school on generating delinquent behavior. Thus, it suggests that this research finding does not fully support what major theories predict.

Strain theory predicts that school is one of the social institutions where frustrations are sharply felt. Negative experiences at school produce the lowering of expectations of school, the heightened sense of strain because of the isolation from conventional school environment, and the consequent projection into delinquent activities (Welsh et al., 1999; Jenkins, 1997). Subcultural theory also predicts that there is an inverse relationship between the likability of association with delinquent peers and school success (Cohen, 1955; Cloward and Ohlin, 1960; Miller, 1958).

Control theory also explains the causal relationship between school-related factors and gang delinquency. It stresses attachments to teachers, positive experiences in school activities, and desires or plans for future educational success as factors that contribute to decreasing adolescents' involvement in delinquent activities. Hirshi (1969) and Hindelang (1973) argue that a school failure risks losing both current rewarding experiences and future educational and occupational opportunities, so greater delinquency is closely related with lower academic achievement, negative school-related attitudes, and less involvement in school activities. Thus, there seems to be no doubt that school success and school attachment deserve a place in any serious delineation of the factors that produce adolescents' delinquency.

Community

The findings from this research show that adolescents' subjective feeling about the condition of neighborhood they belong to has a significant impact on their engagement in gang affiliation, and it fully reflect what major theories of deviance predict regarding the causal relationship between neighborhood problem and delinquent behavior.

Strain and subcultural theory cooperates each other to show the relationship (Merton, 1938; Cloward & Ohlin, 1960). These two theories maintain that some neighborhoods are more tolerant of predatory property crime than others, and opportunities exist for adolescents to be integrated into adult criminal networks. These neighborhoods give rise to criminal subcultures, in which the adaptation of innovation is highly prevalent. In other neighborhoods, criminal activity may be strongly suppressed, and access to both legitimate and illegitimate means of achieving goals may be limited. In these neighborhoods, retreatist subcultures and modes adaptation may be more common (Cloward & Ohlin, 1960). The retreatist adaptation may be characterized as double failures for individuals who have failed to achieve any success at illegal endeavors. The conflict subculture arises in neighborhoods where social organization is so weak that the neighborhood is ineffective at suppressing violence and other illegal behavior. Conflict subcultures are characterized by crime that is "individualistic, unorganized, petty, poorly paid, and unprotected" (Cloward & Ohlin, 1960, p. 173).

Elements of control theory are also incorporated into other perspectives, notably the ecological perspective. Shaw and Mckay (1972) attributed high levels of delinquency in inner city zones of transition to the breakdown of social organization and the lack of effective social control. Cloward and Ohlin (1960) included elements of social control

in their explanation of delinquency, especially for explaining the prevalence of different types of subcultures in different neighborhoods.

Social class

Based on the findings from this research, it is assumed that social class is closely related with adolescents' affiliating with gang delinquency, and this result is congruous with what major theories of deviance predict. Strain and subcultural theory predict an inverse relationship between socioeconomic status (SES) and delinquent behavior. Strain theory strongly predicts that delinquency and adult crime is more common among lower-class families. Merton's discussion (1938) contains the following suggestions: 1) aspirations are approximately the same in all social classes; 2) expectations are reduced among lower-class adolescents because of their disadvantages in the competition for educational, occupational, and economic success; 3) the pressure toward delinquency is proportional to the discrepancy between aspirations and expectations; and 4) delinquent behavior is therefore primarily a lower-class phenomenon. Cloward and Ohlin (1960) share this same presumption of greater lower-class deviance, and they extend the analysis to include opportunities for various kinds of illegal activities as another important variable in determining specific delinquent responses. In order to explain greater amounts of lower-class delinquency, Cohen (1955) also argues that almost all boys aspire to success in middle-class schools, but those lower-class boys are at a disadvantage in doing well because of deficient socialization and the school's bias that gives advantage to middle-class boys, and they experience status frustration against their own middle-class values. In response to this unfavorable condition, according to Cohen, delinquent gangs of lower-class boys are formed as a collective solution to shared frustrations.

Subcultural theory does not imply a necessary relation between social class and delinquency. For example, Sutherland's notion of differential association applies to delinquent acts in any social stratum. However, some studies based on subcultural theory suggest that subcultural norms and values that are linked to one's delinquent behavior are presumed to be prevalent among the lower class. Miller (1958) argues that a separate lower-class subculture in America is built around a set of focal concerns that differ significantly from those of the middle class. From this outline of the subcultural perspective, several implications are evident, such as 1) delinquency is conformity to norms; 2) middle-class and lower-class youths have different norms, values, and aspirations; 3) delinquency is primarily a lower-class occurrence, as middle-class norms prevail in that part of society which is given authority to define delinquency and to label the offender.

The implication from both strain and subcultural theory is that the frequency, the seriousness, and even the basic patterns or types of delinquent behavior should vary by social class position. Control theorists, on the other hand, commonly make no assumption about the relative strength of social controls or bonds in different social classes, so they make no class-related claims. This approach has resulted in part from the development of self-report techniques of measuring delinquent behavior and the consequent questioning of the causal role of social class. The more recently developed control formulations therefore encountered no presumed fact of a social class influence on delinquency to explain.

Future-oriented strain

The model in Table 3 shows that there is no causal relationship between strain and delinquent behavior. However, strain theory strongly stresses the relationship between these two variables. Strain theory is the most future oriented of the major perspectives. In fact, aspirations, expectations, and the discrepancy between them are all present feelings about future hopes and possibilities that trigger the frustration in the mind of the lower-class youth who sees his or her chances for success blocked at every turn (Merton, 1938; Agnew, 1985). Thus, it follows that aspiring to a future of wealth and status can become a key element in the processes generating illegal behavior. Subcultural theorists are generally mute on the effects of perceptions of the future in the etiology of delinquency. They rarely tread beyond that point in the immediate future at which delinquent responses are expected to receive approval from delinquent associates. Control theory is typically present oriented, with its emphasis on situational factors and current social bonds. As Briar and Piliavin state that "younger boys, those in the age group with the highest rate of delinquent behavior, are not affected by job market conditions; rather, their behavior is influenced, as we have argued above, by more mundane situational considerations" (1965, p. 290).

Delinquent value

The findings presented in Table 3 presents the result that there is strong significant relationship between delinquent value and delinquent behavior. Each of the major theories places some significance upon personal values as influencing the likelihood of adolescents' affiliating delinquency. However, subcultural theory put the most emphasis on this issue among these three orientations. Subcultural theorists like Miller (1958) and Cohen (1955) depict American values as sharply dichotomized between middle class and lower class. No one really acts against personal values, and the values just happen to differ. Thus, all delinquents should believe in the appropriateness of their delinquent acts. Control theorists generally include some sort of "internal control" (Nye, 1958, p. 7) or

conscience, or belief in the moral validity of social norms (Hirshi, 1969), as one of the sources of preventing deviance. As such, they imply a continuum of individual degree of acceptance of values in agreement with delinquent actions. Moreover, they recognize the possibility of drift from (Matza, 1964), or neutralization of (Sykes and Matza, 1957), personal moral constraints. However, strain theorists, including Merton (1938), posit the virtually universal acceptance of traditional American middle-class values. A great frustration or strain is necessary to induce someone to break through a portion of his or her own value system, which is legitimate norms, in the attempt to fulfill another portion, which is cultural goals, of those same values. However, they rarely stressed the importance of the causal relationships between delinquent value and delinquent behavior

8. Conclusion

Adolescents' gang affiliation in American society is not trivial problem. Thus, there has been pressure on public officials to resolve the problem for enhancing public safety. With this movement, there has been increase of scholarly interests on this topic. However, much more efforts have been put on finding ways of preventing gang delinquency than on finding causes of gang delinquency. Moreover, many studies focusing on the etiology of gang delinquency were based on simplistic theoretical explanation, and it resulted in the partial understanding of gang delinquency because a single theory cannot explain all the possible causes of adolescents' becoming gangs. Therefore, even if this simplistic theoretical approach has been popular, there has been an increase in scholarly interest on attempting to figure out the cause of gang delinquency based on the comprehensive theoretical perspective, and this is a theoretical approach that the research here was established on, so the purpose of this research is to helps the public to have a better understanding of social circumstances in that adolescents are affiliated with a gang based on surveying the reliability of various theoretical perspectives in the multiple models.

To fulfill this research purpose, I began with presenting the group of existing sociological theories of deviance: strain, subcultural, and control theory. And then, I surveyed the great deal of previous research attempts that were built upon those major theories of deviance. Based on a rigorous literature review, several research questions were made to hypothesize the causal relationship between a multitude of risk factors, including social class, family relationships, school experiences, future-oriented strain or frustration, delinquent associates with peer pressure and peer approval, delinquent value, and community problems, and adolescents' gang affiliation. This hypothesis was tested to see not only if those risk factors influence adolescents' involvement in gang activity but also to evaluate how effective existing major theories of deviance are to explain and analyze why some adolescents are more involved in gang related activities than others, and that is summarized in Table 4.

Before I discuss the contents of this table, I have to point out some technical issues. First of all, it was my discretion to divide risk factors into two categories, which are "risk factors with primary influence" and "risk factors with no influence". Even if I thoroughly reviewed the discussion section to divide risk factors into those two categories, there can be possibility of irrationality caused by the arbitrarily nature of making these subdivisions and naming each division by me. Second, in order to make the research finding more consistent with previous studies shown in the literature section on gang delinquency, I combined variable "school attachment" and "school performance" into one risk factor and named it "school experience". Moreover, I added "peer pressure" and "peer approval" into "delinquent associates", so "delinquent associates" represents the school-related risk factor.

Table 4. Summary of The Relative Importance of The Major Risk Factors on Gang Delinquency, as implied by Theoretical Traditions and as found in This Research

	Risk Factors with Central or primary Influence	Risk Factors with little no influence
Strain perspective	Future-oriented strain	Delinquent associates
	Social class[1]	Delinquent values
	Community problems	Family relationships
	School experiences	
Subcultural perspective	*Social class*	Future-oriented strain

[1] Italic text in this table represents a risk factor that both a theory of deviance and the findings of this research both predict to have a causal relationship with adolescents' gang affiliation.

	Delinquent associates	Family relationships
	Delinquent values	
	Community problems	
	School experiences	
Control (bonding) perspective	Family relationships	Social class
	School experiences	Future-oriented strain
	Delinquent values	Delinquent associates
		Community problems
Research findings	Delinquent associates	Family relationships
	Delinquent values	Future-oriented strain
	Social class	School experiences
	Community problems	

Source: The sections of finding and discussion

As shown in Table 4, this study found out the group of risk factors that are closely related with adolescents' gang affiliation, such as delinquent associates, delinquent values, social class, and community problem, and this finding is more consistent with what subcultural theory predicts than the other two theories of deviance. Based on surveying previous studies and this study, all of four risk factors that are identified as the sources of making adolescents joining a gang are these four risk factors that are identified to have a strong causal relationship with adolescents' gang affiliation in this study are classified as the major sources of gang delinquency by subcultural theory, whereas two risk factors (social class and community problems) and one factor (delinquent values) are identified as the risk factor of gang delinquency by strain and control theory.

Several issues are also identified and should be considered for further research. One of those issues is that a further research should be based on searching for and incorporating other variables into these existing variables and refining the specification of conditioning effects of other variables that alter the causal processes in given situation. In other words, with a more refined research scheme it could be highly possible to have a different research finding in that other theories might be even better predictive of adolescents' gang affiliation than subcultural theory.

Although there are some needs for further researches to complement this research's insufficiency, this study contributes to incorporating competing conceptions and propositions to make a strong hypothesis that better predict adolescents' gang affiliation. This attempt derives from an assumption that a study that examines the cause of adolescents' gang delinquency or just general human delinquency should be based on surveying the role of a multitude of risk factors on delinquency rather than investigating only single factor in order to better have more comprehensive understanding of the pattern of human behavior.

The heading of a section should be in Times New Roman 12-point bold in all-capitals flush left with additional 6-points of single space above the section head. Sections and subsequent sub-sections should be numbered and flush left. For a section head and a sub-section head together (such as Section 2 and sub-section 2.1), use no additional space above the sub-section head.

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