Criminology, Criminal Justice, Law & Society



E-ISSN 2332-886X Available online at https://scholasticahq.com/criminology-criminal-justice-law-society/

Desistance from Criminal Offending: Exploring Gender Similarities and Differences

Elaine Gunnison

Seattle University

ABSTRACT AND ARTICLE INFORMATION

Over the past several decades, researchers have more fervently examined female offending. The criminal career research paradigm put forth by Blumstein and colleagues in 1986 offers an opportunity for researchers to examine offending, including female offending, from multiple perspectives including onset, persistence, and desistance from a multitude of theoretical traditions. Using data from the National Youth Survey, this investigation examined the similarities and/or differences between female and male discrete offender groups (desisters, persisters, late onseters, and conformers) and theoretical predictors of desistance and persistence from less serious crimes. Results of the research revealed significant gender differences between the discrete offender groups as well as similarities and differences between the genders in predictors of desistance and persistence for less serious crimes. Implications of the results are discussed.

Article History:	Keywords:
Received 2 February 2014 Received in revised form 19 August 2014	Desistance; persistence; gender; discrete groups; life course
Accepted 2 September 2014	© 2014 Criminology, Criminal Justice, Law & Society and The Western Society of Criminology Hosting by Scholastica. All rights reserved.

Developmental, or life course, criminology emerged in the 1980s and has fundamentally changed how researchers today view offending patterns. No longer satisfied with single factor explanations for criminal involvement, such as strain or delinquent peer associations, developmental criminologists of this time began to push the boundaries in the discipline and sought to examine several risk factors, in tandem from a multitude of disciplines (e.g., psychology, sociology, biology), for offending patterns (Loeber & Le Blanc, 1990). Developmental criminologists sought to understand how such risk factors exhibit and influence offending patterns over a criminal career while noting that there are various dimensions of offending (e.g., onset, persistence, or desistance; Blumstein, Cohen, Roth, & Visher, 1986). Ultimately, criminal behavior is not just to be understood in the context of onset but rather in facets of a criminal career such as desistance-or breaking away from criminal offending. Moreover, unlike many historical criminological theories that primarily offered explanations for male offending patterns

Author: Elaine Gunnison, Criminal Justice Department, Seattle University, 901 12th Avenue, Seattle, WA 98122. E-mail address: <u>gunnisone@seattleu.edu</u>

(e.g., Cohen, 1955; Hirschi, 1969), developmental theories outlined explanations for both genders (e.g., Moffitt, 1993; Patterson & Yoerger, 1993).

In 1986, Blumstein and colleagues stressed that desistance was not only a crucial aspect of developmental criminology to examine when studying the life course of deviant individuals, but also a significant research area to explore empirically. After this proclamation, patterns of desistance from criminal offending were, at first, largely ignored in criminological research. Since the 1990s, empirical research on desistance has emerged with an even larger amount of research occupying the 2000s. Initially, research that had been conducted on desistance from criminality consisted of examining desistance for males (Loeber, Stouthamer-Loeber, Van Kammen, & Farrington, 1991; Ouimet & Le Blanc, 1996; Shover & Thompson, 1992). However, research soon began to emerge on female desistance patterns as well (Brown & Ross, 2010; Craig & Foster, 2013; Doherty & Ensminger, 2013; Giordano, Cernkovich, & Rudolph, 2002; McIvor, Trotter, & Sheehan, 2009; Sommers, Baskin, & Fagan, 1994; Uggen & Kruttschnitt, 1998; Varriale, 2008).

Despite the proliferation of research on desistance, researchers have yet to examine the similarities and/or differences between discrete groups of offender groups (e.g., desisters, persisters, late onseters, and conformers) and gender using longitudinal data. Gunnison and Mazerolle (2007), for example, examine discrete groups of offenders in their research, but they fail to further investigate how various risk factors distinguish the groups by gender. Additionally, researchers have not examined both females and males longitudinally to determine if factors predicting desistance from less serious criminality are similar and/or different between the genders. The importance of better understanding desistance for female offenders cannot be overstated since some researchers have reported that females desist from crime at a higher rate than males (Weiner, 1989). Thus, understanding the reasons why this may occur can help guide policymakers as to how best to serve both female and male offending populations to ultimately foster desistance. Therefore, using data from the National Youth Survey, this investigation advances previous research by examining female and male discrete offending groups as well as desistance patterns from general delinquency, or less serious crimes.

Theoretical Explanations and Empirical Support for Desistance

Uggen and Piliavin (1998) assert that "criminologists devote relatively little attention to

deriving theoretical understanding of the desistance process. This is because criminological theory and research are primarily concerned with questions of etiology, or the causes of crime" (p. 1400). Few criminologists have developed a comprehensive criminological theory to explain desistance, and some theorists have either merely alluded to its precursors within their own theoretical framework or have provided explanations for it. Additionally, researchers have begun to explore the desistance dimension of criminal offending. The following sections provide theoretical explanations and empirical support for desistance as it relates not only to the theory, but also to gender.

Social Control Theories

Several social control theories have offered explanations for desistance. While some scholars have pointed to age, or a latent trait, as being responsible for desistance from crime, other criminologists have suggested that social variables can better explain desistance patterns (Gottfredson & Hirschi, 1990; Hirschi, 1969; Hirschi & Gottfredson, 1983; Sampson & Laub, 1993). Although Gottfredson and Hirschi (1990) claim in their general theory of crime that desistance can only be explained by age, empirical support for this relationship has been mixed (Pezzin 1995; Shover & Thompson, 1992; Sweeten, Piquero, & Steinberg, 2013). On the other hand, strong empirical support has been found for Sampson and Laub's (1993) age-graded theory which proposed that strong, salient bonds (e.g., marriage, employment) promote desistance from criminality. Numerous researchers have found empirical support for social bonds (e.g., marriage, employment, parental attachment) promoting desistance from criminality (Farrington & West, 1995; Giordano, Seffrin, Manning, & Longmore, 2011; Horney, Osgood, & Marshall, 1995; Laub, Nagin, & Sampson, 1998; Meisenhelder, 1977; Rand, 1987; Sampson & Laub, 1993; Schroeder, Giordano, & Cernkovich, 2010). For example, Sampson and Laub (1993) found that a strong marriage caused many delinquents to break from their criminal ways while Horney and colleagues (1995) found that offenders who resided with their wives were more likely to quit offending. Other researchers have found support for marriage promoting desistance from crime and alcohol and drug use (Farrington & West, 1995; Fillmore et al., 1991; Labouvie, 1996; Laub et al., 1998; Leornard & Homish; 2005; Mischkowitz, 1994; Ragan & Beaver, 2010; Sampson & Laub, 1990; Temple et al., 1991; Thompson & Petrovic, 2009; Warr, 1998) while more recently, some researchers have also found that strong parental attachment with a child may promote desistance (Schroeder et al., 2010).

Empirical exploration into whether marriage promotes desistance for female offenders has been emerging (Bersani, Laub, & Nieubeerta, 2009; Doherty & Ensminger, 2013; Giordano, et al., 2002). For example, Giordano and colleagues (2002) analyzed both quantitative and qualitative data of 93 adolescent males and 104 adolescent females from Toledo, Ohio. The researchers found, contrary to Sampson and Laub's (1993) research, that marital attachment was not related to male or female However, the narrative reviews of desistance. desistance factors conducted by the researchers elucidated several key areas of similarity and difference in desistance patterns for males and females. In their narrative analysis, Giordano et al. (2002) discovered that for a subset of women and men, marriage could promote desistance. That is, marriage partners were perceived as being a "catalyst" for breaking from previous offending patterns. Doherty & Ensminger (2013), examined the impact of marriage on male and female African-Americans yet did not find a strong marriage effect on desistance for females.

Additional research on social bonds promoting desistance has found that employment and even military service can promote desistance for males and females (Craig & Foster, 2013; Horney et al., 1995; Opsal, 2012; Rand, 1987; Sampson & Laub, 1993, 1996). Craig and Foster (2013), in a longitudinal study of youth transitioning to adulthood, found that military enlistment was related to desistance for females but not for males.

Deterrence/Rational Choice Theories

Some scholars have attributed desistance from crime to the individual making a rational decision to quit (Cornish & Clarke, 1986). Empirical support for the deterrence/rational choice perspective on desistance has been mixed. Additionally, desistance research from this theoretical perspective has focused on retrospective and/or qualitative studies, usually conducted on small, unrepresentative samples of male offenders (Esbensen & Elliott, 1994). For example, several researchers have found that male offenders are likely to desist from criminal offending patterns due to fear of imprisonment or the realization that crime was counterproductive to their lives (Cusson & Pinsonneault, 1986; Shover, 1996). In one such quantitative piece, Shover and Thompson (1992) examined desistance from criminality using follow-up data on 948 males who were incarcerated 3 years prior to the analysis. Specifically, the researchers examined whether age had an indirect impact on desistance through one's assessment of the

risks and rewards of criminal continuation. The researchers found that offenders who possessed a low expectation for success in continuing in crimes were more likely to desist.

The exploration into female desistance patterns has uncovered that females who perceive consequences for their criminal behavior(s) are also more likely to desist. In a qualitative study, Sommers and colleagues (1994) examined 30 women via interviews and self-reports. In their study, some females desisted from crime by merely realizing that the deviant way of life they were leading was problematic, while others reached a point in their life where they decided change was necessary and conventional life activities needed to be rediscovered. Of particular interest is the fact that many women in the sample viewed their age as a factor in their desistance pattern. That is, these women feared a longer prison sentence if they were caught again for engaging in criminal activity. In a quantitative piece that examined males and females, Pezzin (1995), who analyzed data from the Youth Cohort of the National Longitudinal Survey, investigated the decision to terminate involvement in The researcher found that criminal activities. sanction costs were a significant predictor of desistance. Specifically, she noted that individuals who possessed high legal earnings, or high legitimate income, were most likely to break from previous offending patterns. Therefore, from what little research that has been conducted on examining the relationship between deterrence/rational choice theory and desistance, it appears that males and females describe similar explanations for desisting from a life of crime.

Differential Association/Social Learning Theories

Criminologists have attributed criminal involvement to the learning of criminal definitions and associations with delinquent peers (Akers, 1990; Sutherland, 1947). Therefore, it is expected that exposure to pro-social beliefs and associations with pro-social peers will influence desistance from criminality. In fact, research into drug cessation has revealed that breaking away from anti-social peers strongly influenced desistance from drug use (Lanza-Kaduce, Akers, Krohn, & Radosevich, 1984; White & Bates, 1995).

Other empirical research outside the realm of drug research has yielded support for differential association/social learning theory and its role in explaining desistance from crime. In a longitudinal study of 297 males and 269 females, Ayers and colleagues (1999) found that for both males and females, involvement with more conventional peers predicted desistance from criminality. Upon analyzing data on males collected from the National Youth Survey, Warr (1993) found that peer associations in his sample changed as the subjects aged. He discovered that as subjects grew older, their delinquent peer associations decreased and that, in turn, resulted in decreases in criminal involvement Drawing on Sutherland's differential patterns. association theory, Warr (1998) investigated whether links between major life course transitions and desistance from crime are attributable to changing relations (e.g., less time spent with certain deviant friends or making new prosocial friends) with peers. In this analysis, again using the National Youth Survey, Warr (1998) found that the transition to marriage tends to disrupt or dissolve relations with friends, including delinquent friends. This research lends support to not only differential association/social learning theory, but it also indicates support for the role of social bonds in desistance as outlined by Sampson and Laub (1993). More recently, Sweeten et al. (2013) found that criminal gang disengagement was related to a reduction in antisocial peer associations.

General Strain Theory

A final theory that contributes to the understanding of desistance is general strain theory as proposed by Agnew (1992). General strain theory proposes that when individuals experience strain, they are at an increased risk of experiencing negative emotions, particularly anger. Specifically, when an adolescent becomes angry, his/her inhibitions against committing crime are lowered resulting in an increased likelihood of committing a criminal act because he/she may not possess pro-social coping strategies to handle the anger. Several researchers have found empirical support for strain causing onset into delinquency patterns (Agnew & White, 1992; Paternoster & Mazerolle, 1994). Currently, the research into whether reductions in strain promote desistance has not been empirically explored.

While researchers have not explored whether reductions in strain promote desistance, several researchers have examined gender differences in types of strain and reactions to strain in order to understand the gender gap in criminal behavior (Broidy & Agnew, 1997; Mazerolle, 1998). Broidy and Agnew (1997) explored whether general strain theory is applicable to males and females, and they concluded that the theory explains both male and female offending. However, the researchers noted that males and females experience different types of strain and react differently to these straining influences. In a longitudinal analysis using data from the first two waves of the National Youth Survey, Mazerolle (1998) found evidence of gender differences in the effects of strain on violent offending patterns. For example, Mazerolle (1998) noted that exposure to multifarious negative life events (e.g., the death of a loved one) and negative relations with adults are criminogenic for males but not for females. Therefore, this study can offer a perspective into how well general strain theory informs desistance research and whether strain related processes differ between male and females in predicting desistance.

Other Desistance Factors

Males. Shover and Thompson (1992) found that age predicted desistance, but other factors such as expectations of success from crime and level of education were also found to be significant predictors of desistance. Several other variables have been found to be correlated with desistance. For example, Loeber et al. (1991), using the Pittsburgh Youth study comprised of a sample of 850 male adolescents, found that low social withdrawal, low disruptive behavior, and positive motivational and attitudinal factors were associated with the desistance in offending for this group.

Another factor related to desistance that has not been explored is whether fathers are more likely to desist upon becoming a parent. In a qualitative study of 20 African-American and Latino-American young men, Hughes (1998) suggests that parenthood may be a motivating factor towards desistance. Rutter (1994) also adds that little is known about the effects that teenage fatherhood has on males' life trajectories. However, in the examination of 106 male offenders in a follow-up analysis of the 1945 Philadelphia birth cohort males, Rand (1987) found no significant effect of fatherhood on desistance.

Females. Empirical research on female desistance is historically sparse. Much of the research on female desistance has centered on the use of qualitative data rather than longitudinal quantitative data. Therefore, understanding the desistance patterns for females is even more opaque.

Transitions: Pregnancy and Parenthood. Becoming pregnant or parenthood has emerged in the drug literature as promoting desistance from drug use for female offenders (Yamaguchi & Kandel, 1985). Chen and Kandel (1998) examined 706 male and female marijuana users in high school and then again at age 34-35. The researchers explored cessation from marijuana use and found that becoming pregnant and then becoming a parent were the most important factors leading to cessation of marijuana use for women. While Chen and Kandel (1998) were not examining the link between motherhood and criminality, their study is a stepping stone into the exploration of such a link. Research has been emerging on the possible link between motherhood and desistance from criminal offending patterns. For example, Giordano et al.'s (2002) research does not support this factor as promoting desistance. Upon reviewing studies of teenage pregnancy, Rutter (1994) cautions that overwhelming research has indicated that becoming pregnant during the teenage years has a negative impact on the female's trajectory. However, upon conducting life history interviews with 11 females, Graham and Bowling (1995) discovered that for female offenders, having children exerted the greatest influence on their desistance. More recently, Giordano and colleagues (2011) found that females who became pregnant and wanted to be pregnant may desist from criminal behavior patterns. Parental attachments to children may also contribute to female desistance (Michalsen, 2011).

Additional Desistance Factors: In addition to the factors noted above, researchers have also found other variables that are associated with desistance. One of the few non-qualitative studies that examines female desistance was published by Uggen and Kruttschnitt (1998). Uggen and Kruttschnitt (1998) examined self-reports from a sample of males and females over a three year time period and found very little evidence that unique factors predicted desistance from deviant behavior(s) for males and females. However, when the researchers re-analyzed the group with official data, they found some evidence for gender effects. For example, drug use and prior criminal history increased the risks of arrests for women more than twice as much than for men. Thus, females with prior criminal records and histories of drug use may be less likely to desist. Similarly, Born, Chevalier, and Humblet (1997), using data from the Public Institutions for the Protection of Youth (I.P.P.J.), a project designed to assess the future of 363 male and female institutionalized juveniles in five youth facilities in Belgium, found that length of stay in an institution, time spent in a residential environment, improvement in one's self-image, and attachment to one or more persons predicted desistance from offending. However, the researchers fail to delineate how desistance is similar or different for males and females.

While research on desistance has been flourishing over the past several decades, much remains unknown about female desistance. One explanation for the lack of knowledge regarding female criminal career patterns stems from the fact that the majority of longitudinal studies on offending have been conducted with male samples (Piquero, 2000). In those longitudinal studies that include both males and females, significantly fewer females are often included in the sample, thus precluding researchers from making meaningful conclusions in regard to desistance patterns for females (Giordano et al., 2002). Emerging research on the various dimensions of criminal careers besides desistance, such as persistence and late onset, has enabled researchers to pinpoint risk factors related to membership in discrete groups (Carr & Hanks, 2012; Gunnison & McCartan, 2005; Moffitt, 1993; White, Lee, Mum, & Loeber, 2012; Wiecko, 2014; Zara & Farrington, 2009). However, researchers have yet to vigorously examine how psychosocial risk factors may vary across members of these discrete offender groups in regard to gender. In other words, direct comparisons of risk factors have not been made (except Gunnison & Mazerolle, 2007).

With the above-mentioned limitations in mind, this research attempts to make several contributions to criminological research on criminal careers. This study examines the factors that distinguish desisters from other discrete offending groups (i.e., persisters, late onseters, and conformers) by gender-a step not taken by previous researchers. This research is one of the first prospective longitudinal examinations of male and female desistance patterns where the sample size for females was large enough to conduct meaningful analyses. In addition, this research explores whether the processes that give rise to male and female desistance from general delinquency, or less serious crime, ultimately differ. Given that factors for male and female onset into criminality are paradoxically similar and distinct, factors distinguishing desisters from other discrete offending groups may also be similar and different by gender. Specifically, theoretically informed predictors of desistance from a multitude of criminological theories are utilized in this research for a systematic exploration into what factors may promote desistance.

Method

The data utilized in the following analyses stem from the National Youth Survey (NYS) (Elliott, Huizinga, & Ageton, 1985; Elliott, Huizinga, & Menard, 1989). The NYS is a panel study developed from a national probability household sample of adolescents across the United States and spans years 1976-1993 (Elliott et al., 1985, 1989). Using a multistage, cluster sampling design, Elliott et al. (1985) noted that this sampling procedure resulted in the listing of approximately 67,000 households, 8,000 of which were selected to be included in the sample. The approximate 8,000 households generated 2,360 eligible youth for inclusion in the study. In 1976, 1,725 youths, males and females ages 11-17, were finally selected to be included in the first wave of the NYS.¹ Since the first point of data collection in 1976, eight additional waves of data have been collected on this cohort. In 1993, the last wave of data was collected on this sample when they reached the ages of 27-33. Currently, only seven waves of data are publically available: the data for those waves (1-7) spanning years 1976-1987 were downloaded from the webpage of the Inter-University Consortium for Political and Social Research.

Throughout each of the seven waves of the NYS, data were collected via personal interviews with respondents. In each wave of NYS, the principal focal point was on the immediate prior year. Therefore, the reference period for the measures called for the respondents to recall incidents that occurred in the previous 12 months. In wave 1 of data collection, 1,725 youths were randomly selected for examination in the NYS. Of the 1,725 youths that were selected for inclusion in the wave 1 sample, there were a total of 917 males and 808 females. For purposes of future analyses, only those subjects who have data across all seven waves are included in the final sample. Due to missing data at any wave, 195 individuals were excluded from the final sample. Therefore, the total number of individuals for which data exist across all seven waves is 1,517 subjects² of the 1,725 original sample, representing a 12% attrition rate. Of the 1.517 individuals for which data exists across all seven waves, there were a total of 789 males and 728 females.

At wave 1, the average age of the sample was 13.8 years, 47% of the sample was female, and 63% of the sample reported being employed in the last year. In addition, 79% of the sample were Caucasian, 14% were African-American, and 4% were Latino/a. According to Elliott and colleagues (1985), participating subjects at wave one of the NYS "appear to be representative of the total 11 through 17 year-old youth population in the United States as

established by the U.S. Census Bureau" (p. 92) with respect to the demographic characteristics of age, race, and sex in 1976.

Measuring Desistance

Because empirical research on desistance has been evolving, measurement of desistance has been difficult. In fact, some researchers have explained that there are "serious measurement problems inherent in assessing desistance" (Laub & Sampson, 2001, p. 9). Therefore, research measuring desistance patterns from criminality faces some empirical challenges. How researchers operationally define desistance constitutes one such challenge (Laub & Sampson, 2001). For instance, researchers have defined desistance as no criminal offending for a length of time greater than two years or greater than fifteen years (Farrington & Hawkins, 1991; Sampson & Laub, 1993; Shover & Thompson, 1992).

In the present study, desistance from offending is defined as non-offending for a period of at least three vears.³ For example, any youth who reported participation in less serious criminal acts (e.g., joyriding, selling marijuana, stealing) one or more times during waves 1-6, but not at any time during the years 1984, 1985, or 1986 of wave 7 were classified as a "desister." General delinquency measures were utilized to construct the desister groups and yielded 315 general delinquency desisters. Those youths who reported participation in less serious criminal acts one or more times during waves 1-6 and reported continued participation at any time during the years 1984, 1985, or 1986 of wave 7 were classified as a "persister." Once again, general delinquency measures were utilized to construct the persister groups that resulted in 472 general delinquency persisters. Utilizing the same methodology, there were 92 "conformers" and 34 "late onseters."

Measures of Theoretical Constructs

Measures included in the analyses included characteristics from a multitude of criminological traditions including social control, deterrence, strain, and social learning. For example, to address Gottfredson and Hirschi's (1990) assertions about low self-control, an attitudinal measure of antisocial "propensity" adapted from Paternoster and Mazerolle's (1994) research is included in the analysis. Respondents were asked a series of questions to assess whether they approved of criminal or antisocial behaviors (e.g., lying, cheating, beating others up, breaking rules, breaking laws). The scale was constructed by summing across eleven questions.

A series of measures were included to assess indicators of social control. For example, to gauge

family attachment, respondents were asked about their relationships with parents (e.g., amount of warmth and/or affection. support and/or encouragement received from parents). A scale was created by summing across four items that assess dimensions familv various of attachment. Respondents were asked about their marital status (not married = e.g., single, widow, etc., versus married) and the quality of the marital relationship, including questions on the importance of marriage and marital satisfaction, to gauge marital status and attachment to a spouse/partner. For the current analysis, a spouse attachment scale was constructed by summing across six items that tapped respondent's ties to their spouse. The NYS also includes items that assess with whom respondents reside. This allows for an assessment of whether there are differential influences on desistance for respondents residing with a spouse as opposed to a boyfriend/girlfriend. Responses on with whom the respondent was living during the past year were coded into two separate dummy variables where 1=spouse and 0=not a spouse or 1=boyfriend/ girlfriend and 0=not a boyfriend/girlfriend.

Further measures of social control considered child attachment. Respondents were asked about the number of hours per week spent with children, whether they enjoyed being with their children, and whether they were satisfied with their relationship with their children. The three items were summated to create a child attachment scale.⁴

Respondents were asked to assess how wrong certain acts (e.g., destroying property, selling drugs) were, and responded on a scale ranging from very wrong to not at all wrong in order to gauge prosocial attitudes. The nine items comprising the prosocial attitudes scale were based on a scale previously constructed by Paternoster and Mazerolle (1994). Respondents were asked to report how much time they spend engaging in conventional activities (e.g., studying, in school activities) during the evenings of a school week and on the weekend in order to determine involvement in conventional activities. Responses from 12 questions were summed across categories to create a scale gauging involvement in conventional activities.

Social control measures were also included for education level (dummy variables assessing high school graduation status and college graduate status), employment status (employed in past year), attachment to work (importance and satisfaction with work), religious attachment (how often they attended religious services and how important religion was in their lives), pregnancy (ever pregnant), and drug and alcohol use (how often used alcohol and drugs in the past year). To assess differential association/social learning theory, exposure to deviant peers was assessed by asking respondents if they had friends who had committed a variety of criminal and delinquent offenses (e.g., sold drugs, cheated on school tests). A nine item scale was used in the current study based on one previously constructed by Paternoster and Mazerolle (1994). A measure for attachment to peers was also included. This nine item scale was based on the items used previously by Warr (1998; i.e., time spent with peers) and also includes measures assessing peer influence, peer importance, peer satisfaction, peer support, and peer loyalty.

To assess strain, a measure of occupational strain was included (e.g., a five-item measure to gauge strain from the gap between educational aspirations such as graduating from college and occupational expectations such as getting a good job or earning a good salary) as well as measures of negative or noxious influences including neighborhood problems (e.g., vandalism, abandoned houses, burglaries and thefts, run-down buildings, muggings and assaults), negative life events (of parents and respondent such as serious accidents, illnesses, death, divorce, unemployment), and negative relations with adults (e.g., parents thinking respondent needs help, is a bad kid, is messed up, gets into trouble, does things against the law, and breaks rules; c.f. Paternoster & Mazerolle, 1994).

Measures for certainty and severity of punishment were included in order to assess deterrence or rational choice influences. According to the theory, individuals weigh the costs and benefits of any action prior to making a decision to become involved in crime. In the NYS, respondents were asked what they thought their chances are of getting ticketed/arrested for becoming involved in a series of acts (e.g., attacking someone, stealing something worth more than \$50). Respondents indicated their responses ranging from a 0 to 10, indicating a 0% chance to 100% chance respectively, and a six-item certainty scale was created where high scores indicate a high perception of certainty of punishment. Respondents were questioned about their perception of severity of punishments for a variety of criminal acts (e.g., attacking someone, breaking into a building) to assess severity. A six item severity scale was constructed where high scores indicate a high perception of the severity of punishment.

Measures of Theoretical Constructs

Following Elliott et al. (1985, 1989), a general delinquency scale⁵ was created using specific items sought to tap general acts of delinquency, or less serious crime. This scale was created by summing

the responses of 9 items and including a range of items from carrying a hidden weapon to theft.

Measures of Theoretical Constructs

Several control variables were utilized in the multivariate analyses. Age was a control variable measured in years at the time of the assessment. A second control variable utilized in the analyses was race and was coded 0 for white and 1 for non-white. Sex was also used, whereby males were coded as 0, and females were coded as 1.

Analyses

The analysis first involved conducting a series of ANOVA comparisons between discrete offender groups (i.e., desisters, persisters, late onseters, and conformers) to assess whether various psychosocial characteristics at wave 6 actually differ across groups. T-test comparisons were then conducted to assess where precise mean level differences exist between desisters and persisters. These comparisons also allow for an assessment of how the characteristics differ between genders. Finally, logistic regression analyses were conducted for the female and male samples in order to pinpoint whether any of the theoretically driven variables predicted desistance from general delinquency.

Results

The Role of Gender for Discrete Offender Groups

After ANOVA comparisons were made on the various psycho-social risk factors for the discrete groups to determine if differences existed between the groups, t-test comparisons were conducted between the discrete groups to better pinpoint how the groups may have differed. The results of mean level comparisons across discrete offender groups (e.g., desisters, persisters, late onseters, and conformers) for females are reported in Table 1 while results of post-hoc tests for males are reported in Table 2. In general, the results reveal a number of important similarities and differences across groups.

	Fable 1	1 - T	-Test	Comparisons	Between	Discrete	Offender	Groups	(wave 6:	Females)	n = 72	28
--	----------------	-------	-------	-------------	---------	----------	----------	--------	----------	----------	--------	----

		T-Va	lue			
	D vs. P	D vs. L	D vs. C	P vs. L	P vs. C	L vs. C
Social Control						
Marital Status (1983)	3.053**	366	1.195	1.487	-1.097	.937
Moral Belief Index	2.341**	-1.892*	-3.158**	-2.296**	-4.927**	.097
Involvement in Conventional Activities	1.966*	1.879*	459	1.181	-1.876*	-1.736*
Employed (1981)	.748	.547	2.441**	.215	1.845*	.767
Employment Attachment	1.133	.691	-2.966**	.347	-4.033**	-1.481
Religious Attachment	2.230**	-1.142	-3.047**	-1.903*	-4.337**	498
Transitional Life Events						
Failed Pregnancy	.805	111	-4.097**	438	-5.230**	-1.00
Differential Association/ Social Learning						
Delinquent Peer Exposure	-1.306	1.299	5.605**	2.036**	7.019**	1.238
Peer Attachment	-2.259**	427	-2.019**	.483	050	539
Strain						
Traditional Strain	.073	490	-3.163**	538	-3.346**	-1.265
Neighborhood Problems	-2.010**	.171	1.304	1.033	2.802**	.492
Deterrence/Rational Choice						
Certainty of Punishment	2.724**	2.237**	-1.531	1.457	-3.358**	-2.692**
Severity of Punishment	2.441**	2.349**	-1.419	1.284	-3.206**	-2.906**
Drug/Alcohol Use		-	-	•	-	•
Use-1981	-1.961*	2.546**	6.645**	3.331**	8.215**	.304
Use-1982	-1.538	4.095**	6.372**	3.394**	7.649**	.095
Use-1983	-1.326	3.052**	7.144**	3.836**	7.892**	1.457

a T-values are those obtained after adjusting for non-homogeneity of variances.

* p < .05

** p < .10

		Т-\	alue			
	D vs. P	D vs. L	D vs. C	P vs. L	P vs. C	L vs. C
Social Control				-		-
Marital Status (1983)	1.454a	.493	-1.357a	122	-2.039a*	-1.450a
Moral Belief Index	2.283**	-2.932a**	-5.622a*	-4.860a**	-8.868a**	-1.240a
H.S. Graduate	1.685a*	.267	-2.640a**	345	-4.772a**	-1.254a
Employed (1981)	1.082a	1.966a*	1.597a	1.661a	1.186a	548
Employed (1982)	.847	2.199a**	1.294a	1.969a*	.976a	-1.037
Religious Attachment	2.289**	329	-2.771**	-1.388	-4.272**	-1.892*
Differential Association/						
Social Learning						
Delinquent Peer Exposure	-4.559**	3.393a**	4.00a**	8.240a**	7.127a**	1.416
Peer Attachment	.935	2.756**	2.102a**	2.321**	1.818a*	071
Strain						
Negative Relations with Adults	-2.983a**	.201	1.605a	2.649a**	4.239a**	.926
Deterrence/Rational Choice						
Severity of Punishment	1.389	300	-1.451	938	-2.241**	757
Drug/Alcohol Use						
Use-1981	-1.678	4.126a**	3.552**	5.724a**	5.625a**	.317
Use-1982	-1.588	4.625a**	3.939**	6.535a**	6.729a**	.796a
Use-1983	-2.615a**	2.234**	5.248a**	4.78a**	7.924a**	1.206

Table 2 - T-Test Comparisons Between Discrete Offender Groups (wave 6: Males), n = 789

a T-values are those obtained after adjusting for non-homogeneity of variances.

** *p* < .05

* *p* < .10

T-test comparisons (p < .05, p < .10) reveal that female desisters from general delinquency differed from the other discrete groups on factors such as marriage, moral beliefs, attachment to religion, certainty and severity of punishments, attachment to peers, drug/alcohol use, and neighborhood problems. Specifically, t-test comparisons, presented in Table 1, reveal that female desisters were more likely (p < .05)than female persisters to be married in 1983, possess stronger moral beliefs, and to be attached to religion. Additionally, female desisters had more (p < .05)failed pregnancies than female conformers. Further, female desisters were more likely (p < .10) to be involved in conventional activities than female persisters or female late onseters. However, female desisters were less likely (p < .05) to be attached to religion than female conformers. Moreover, female desisters had significantly (p < .05) less traditional strain than conformers and were less likely (p < .05)than persisters to reside in a neighborhood plagued Also, female desisters perceived by problems. significantly (p < .05) higher certainty and severity of punishments than persisters or late onseters, but they were more likely (p < .05) to use drugs/alcohol in 1981, 1982, and 1983 than female late onseters and female conformers.

Through pairwise comparisons of these variables, presented in Table 2, many significant differences between the male discrete groups emerged. For example, male desisters had stronger (p < .05) moral beliefs than persisters, but were significantly less likely to possess strong moral beliefs than male late onseters (p < .05) and male conformers. In addition, male desisters were significantly more likely (p < .10) to graduate from high school than male persisters, but male desisters were less likely (p < .05) to graduate from high school than male conformers. Further, male desisters were more likely to be employed in 1981 (p<.10) and 1982 (p < .05) than male late onseters. Moreover, male desisters were significantly (p < .05) more strongly attached to religion than male persisters, but they had weaker religious attachment when compared to male conformers. Male desisters were significantly less likely (p < .05) to have delinquent peer associations than male persisters. However, male desisters were significantly more likely (p < .05) to have delinquent peers and attachment to peers than male late onseters

and male conformers. Also, male desisters were significantly less likely (p<.05) than male persisters to have negative relations with adults. The t-test analyses did reveal that male conformers were significantly more likely (p<.05) to perceive a high severity of punishment than male persisters. Finally, male desisters were significantly more likely (p<.05) to use drugs/alcohol in 1981, 1982, and 1983 than male late onseters and male conformers but significantly less likely (p<.05) to consume drugs/alcohol than male persisters.

In sum, significant similarities and differences emerged between the discrete offender groups across gender. While some risk factors for the discrete groups were similar across gender, such as moral beliefs and drug/alcohol use, differences between the groups emerged as well. For instance, the genders differed on marriage, delinquent peer exposure, and neighborhood problems. In order to ascertain whether the risk factors that predict desistance from general delinquency were similar or different for the genders, logistic regression analyses were utilized.

The Role of Gender in Predicting Desistance and Persistence from General Delinquency

An examination of which psycho-social factors predict desistance and persistence from general delinquency for female offenders at wave 6 is presented in the Appendix.⁶⁷ Results of the analyses

revealed that age was a consistently significant (p < .05) predictor of desistance and persistence of general delinquency across all twenty-one models. In a majority of the models, respondents who were older were more likely to desist. For social control theory, marital status in 1983 predicted female desistance Specifically, being married was where p < .05. associated with desistance. This finding supports Sampson and Laub's (1993) contention that the development of a quality marital bond can promote desistance as well as Giordano et al.'s (2002) research regarding female desistance. Religious attachment also predicted female desistance (p < .05). In addition, neighborhood problems were negatively associated with desistance and were, therefore, a significant predictor of persistence (p < .10). Further, a perception of high certainty and severity of punishment (p < .05) was also predictive of female desistance from general delinquency. Finally, drug/alcohol use in 1981 significantly differentiated female persisters from female desisters with persisters being more likely to utilize drugs and alcohol during this year. For the full model,⁸ females who were older, married, had parents who had experienced negative life events in 1983, and perceived a high certainty of punishment were more likely (p < .05, p < .10) to desist from general delinquency (see Table 3).

Variable	В	SE B	Wald	df	р
Age	.1264	.0642	3.8795	1	.0489
Marital Status (1983)	.5215	.2649	3.8758	1	.0490
Negative Life Events-Parents (1983)	.3674	.2191	2.8105	1	.0937
Certainty of Punishment	.1902	.0900	4.4678	1	.0345
Use-1981	1450	.0999	2.1089	1	.1465

Table 3. Wave 6 Predictors of Desistance/Persistence from General Delinquency, Females-Full Model

Table 4. Wave 6 Predictors of Desistance/Persistence from General Delinquency, Males-Full Model

Variable	В	SE B	Wald	df	р
Age	.0637	.0724	0.7734	1	.3792
Moral Belief Index	.3218	.2040	2.4894	1	.1146
Delinquent Peer Exposure	2137	.0746	8.1988	1	.0042
Negative Relations with Adults	2199	.2174	1.0230	1	.3118
Use-1983	.1329	.1268	1.0993	1	.2944

An examination of which psycho-social factors predict desistance (versus persistence) from general delinquency for male offenders at wave 6 is presented in the Appendix. Results from the analyses revealed that age is a significant predictor (where p<.05, p<.10) of desistance from general delinquency for all models with the exception of two. Specifically, male respondents who were older were more likely to desist and those who were younger were more likely to persist. For social control theory, higher levels of moral beliefs, family attachment, and religious attachment increased the likelihood (p<.05, p<.10) of desistance for males. However, delinquent peer exposure (p<.05) and negative relations with adults (p<.05) increased the likelihood of male persistence from general delinquency. Finally. drug/alcohol use in 1981, 1982, and 1983 significantly differentiated male persisters from male desisters with persisters being more likely to utilize drugs and alcohol during these years. For the full model,9 males with delinquent peer associations had an increased likelihood (p<.05) of persistence in general delinquency.

In sum, logistic regression analyses of wave 6 predictors of desistance/persistence from general delinquency for females revealed that respondents who are older, married in 1983, have parents who experienced negative life events, and possess a high perception of the certainty of punishment are more likely to desist. On the other hand, for males, reductions in delinquent peer associations increased the likelihood of male desistance from general delinquency.

Discussion

The results illustrate that numerous theories provide useful accounts for understanding desistance. One of the central themes in this research investigation was the exploration into whether gender similarities and/or differences exist across discrete offender groups. Results from the t-test analyses revealed similarities in the psycho-social factors that distinguished desisters from other discrete offender groups by gender. That is, there are indeed distinct similarities and differences in risk factors for both female and male desisters when compared to other discrete offending groups such as persisters. Female desisters were more likely than female or male persisters or male desisters to be married. This finding is consistent with findings by Gunnison and Mazerolle (2007; however, it is at odds with other research that has posited that marriage should differentiate desisters from other offending groups (Sampson & Laub, 1993). Similarly, both female and

male desisters demonstrated reductions in drug and alcohol use compared to female and male persisters. Thus, measures derived from several criminological theories appear important for differentiating desisters and persisters.

Another central theme of this research was to explore the predictors of desistance from general delinquency by gender and to pinpoint any similarities or differences. Conducting logistic regression analyses revealed that there are some similarities and differences in the predictors of female and male desistance from less serious crime. Age was a consistent predictor of female and male desistance from less serious crime. For example, females and males who were older were more likely to desist from general delinquency. This finding supports Hirschi and Gottfredson's (1983) argument that the relationship between age and crime is direct regardless of gender.

While there were some similarities in the predictors of desistance across gender, differences also emerged across gender. One of the biggest differences in predictors of desistance for females and males was marriage. Females who were married were more likely to desist from general delinquency. This finding is consistent with some researchers who have found a small "marriage effect" for females in relationship to desistance (Doherty & Ensminger, 2013; King, Massoglia, & MacMillan, 2007; Simons, Stewart, Gordon, Conger, & Elder, 2002). On the other hand, marriage was not a significant predictor of male desistance. While some previous research has found marriage to be a predictor of male desistance from criminality (Craig & Foster, 2013; Horney et al., 1995; King et al., 2007; Sampson & Laub, 1993), other research has suggested that the relationship between marriage and desistance for males is not direct and that disruption in delinquent peer associations may explain male desistance more so than marriage (see Simons et al., 2002; Warr 1998, 2002). Previous research linking male desistance to reductions in delinquent peer associations was yet another key difference between the genders in this research investigation. In fact, a reduction in delinquent peer associations was the only predictor of male desistance from less serious crime. This finding lends support to social learning theories that posit that individuals learn criminal or conforming behavior from their associations (Akers, 1990; Sutherland, 1947). Further, this finding lends support to assertions made by previous researchers that reductions in delinquent peer associations, rather than marriage, explains male desistance (Simons et al., 2002; Warr 1998, 2002). Another difference in the predictors of desistance was having parents who experienced negative life events. This predicted

female desistance but not male desistance. Since this finding is at odds with strain theory, further exploration is required. Finally, for females, a perception of high certainty of punishment predicted desistance from less serious crime, but these predictors did not impact male desistance from less serious crime. Thus, this finding lends some initial support for the deterrence/rational choice perspective and adds to the scant literature on the relationship between this theoretical tradition and female desistance, which has suggested that females may desist from crime when they realized the impact of their decisions (see Sommers et al., 1994).

One limitation of this research centers around the reliance on self-reports of offending. The use of selfreports can be problematic. Respondents may exaggerate their involvement in crime or just forget to report the types of crimes in which they partook (Bachman & Schutt, 2013). Additionally, self-report crime surveys tend to have respondents report on minor forms of criminal offending. Since this research investigation focuses on minor forms of offending from the self-report survey, this is yet another limitation of this study. Moreover, the data utilized for this research investigation is from an older dataset. Despite its age, the NYS was still utilized since the dataset is rich in psychosocial variables and because there is a lack of existence of, or researcher access to, other longitudinal data set alternatives-including datasets that may be a bit more modern. Although the data are older, the theoretical constructs that are being investigated should remain relatively invariant across generational strata. The age of the data does pose a couple possible limitations including: 1) several types of criminal acts are not captured (ex., technology based crimes); and 2) the absence of nuanced risk factors (ex. prior sexual abuse) for females are not included in the dataset.

A further limitation of this research investigation concerns the operational definition of desistance. Some researchers argue that desistance is not a state but rather a process (see Bushway, Thornberry, & Krohn, 2003; Steffensmeier & Ulmer, 2005). While employing a process definition is appealing since it overcomes the limitations of the static definition of desistance (i.e., arbitrary and inconsistent measures of when desistance occurs), researchers still disagree on whether the operational definition of desistance should be considered as a process. Clearly, measuring desistance as a process is not the current norm in the field. Regardless of the overall finding that significant differences do not exist between females and males, this research does inform the field of criminology about the theories that may offer a contribution to the understanding of desistance. For

instance, Sampson and Laub's (1993) age-graded theory provides several predictors of female and male desistance from general delinquency. Additionally, differential association/social learning theory also explains female and male desistance from general delinquency. In regard to strain theory, many of the strain variables did not predict desistance from general delinquency. Finally, deterrence/rational choice theory offers a solid explanation for female desistance from general delinquency but failed to predict male desistance from general delinquency. Thus, to summarize the results, criminologists should consider developing a unified theory of desistance for females and males. A unified theory that integrates age-graded theory, differential association/social learning theory, strain theory, and deterrence/rational choice theory would be appropriate for explaining female desistance from less serious crime. Moreover, a comprehensive theory that draws on age-graded theory, differential association/social learning theory, and strain theory would also contribute to explaining male desistance from less serious crime.

One research implication from this study is that correctional programming to foster desistance should be both inclusive and gender specific. Results from this investigation revealed that females who perceived high certainty of punishment were more likely to desist. Implications of this finding suggest that rehabilitation programs administered to female delinquents in a correctional setting or an out-patient group therapy session should strive to build the female's perception of how certain punishments meted out by the criminal justice system can be. The research findings of this investigation also offer policy implications for gender specific programming for males. For instance, reductions in delinquent peer associations predicted male desistance. Therefore, mentoring programs that introduce pro-social interactions and foster associations and bonds with non-delinquent peers may help to promote male desistance from less serious crimes (Shover, 1996).

In conclusion, while some researchers have concluded that psycho-social predictors of crime are similar across gender, other criminologists have argued that predictors of crime may vary between females and males (Belknap, 2007; Burton, Cullen, Evans, Alarid, & Dunaway, 1998; Smith & Paternoster, 1987). The results from this investigation reveal some similarities and differences in the risk factors between discrete offender groups by gender and the predictors of female and male desistance from less serious crime. Therefore, researchers studying desistance cannot assume the generality of effects of variables across gender (see Gottfredson & Hirschi, 1990); rather, they must also consider the possibility of specific effects of predictors on female and male desistance.

References

- Agnew, R. (1992). Foundation for a general strain theory of crime and delinquency. *Criminology*, *30*, 47–88. doi: 10.1111/j.1745-9125.1992.tb01093.x
- Agnew, R., & White, H. R. (1992). An empirical test of general strain theory. *Criminology*, *30*, 475– 505. doi: 10.1111/j.1745-9125.1992.tb01113.x
- Akers, R. L. (1990). Rational choice, deterrence, and social learning in criminology: The path not taken. *Journal of Criminal Law and Criminology*, *81*, 653–676. doi: 10.2307/1143850
- Ayers, C. D., Williams, J. H., Hawkins, J. D., Peterson, P. L., Catalano, R. F., & Abbott, R. (1999). Assessing correlates of onset, escalation, deescalation, and desistance of delinquent behavior. Journal of Quantitative Criminology, 15, 277–306. doi: 10.1023/A:1007576431270
- Bachman, R., & Schutt, R.K. (2013). The practice of research in criminology and criminal justice (5th ed.). Thousand Oaks, CA: Sage.
- Belknap, J. (2007). *The invisible woman*. Cincinnati, OH: Wadsworth.
- Bersani, B., Laub, J., & Nieubeerta, P. (2009). Marriage and desistance from crime in the Netherlands: Do gender and socio-historical context matter? *Journal of Quantitative Criminology*, 25(1), 3–24. doi: 10.1007/s10940-008-9056-4
- Blumstein, A., Cohen, J., Roth, J. A., & Visher, C. A. (1986). *Criminal careers and career criminals*. Washington, D.C.: National Academy Press.
- Born, M., Chevalier, V., & Humblet, I. (1997). Resilience, desistance, and delinquent careers of adolescent offenders. *Journal of Adolescence*, 20, 679–694. doi: 10.1006/jado.1997.0119
- Broidy, L., & Agnew, R. (1997). Gender and crime: A general strain theory perspective. *Journal of Research in Crime and Delinquency*, *3*, 275–306. doi: 10.1177/0022427897034003001
- Brown, M., & Ross, S. (2010). Mentoring, social capital and desistance: A study of women released from prison. *Australian & New Zealand Journal* of Criminology, 43(1), 31–50. doi: 10.1375/acri.43.1.31

- Burton, V., Cullen, F., Evans, T., Alarid, L.
 & Dunaway, R. (1998). Gender, self-control, and crime. *Journal of Research in Crime and Delinquency*, *35*, 123–147.
 doi: 10.1177/0022427898035002001
- Bushway, S., Thornberry, T., & Krohn, M. (2003). Desistance as a developmental process: A comparison of static and dynamic approaches to the study of desistance. *Journal of Quantitative Criminology*, *19*, 129–153. doi: 10.1023/A:1023050103707
- Carr, N. T., & Hanks, R. S. (2012). If "60 is the new 40," is 35 the new 15? Late onset crime and delinquency. *Deviant Behavior*, *33*(5), 393–411. doi: 10.1080/01639625.2011.636660
- Chen, K., & Kandel, D. B. (1998). Predictors of cessation of marijuana use: An event history analysis. *Drug and Alcohol Dependence*, 50(2), 109–121. doi: 10.1016/S0376-8716(98)00021-0
- Cohen, A. K. (1955). *Delinquent boys: The culture of the gang*. New York: Free Press.
- Cornish, D. B., & Clarke, R. V. (1986). *The reasoning criminal: Rational choice perspectives on offending*. New York: Springer-Verlag.
- Craig, J., & Foster, H. (2013). Desistance in the transition to adulthood: The roles of marriage, military, and gender. *Deviant Behavior*, 34(3), 208–233. doi: 10.1080/01639625.2012.726173
- Cusson, M., & Pinsonneault, P. (1986). The decision to give up crime. In D. B. Cornish & R. V. Clarke (Eds.), *The reasoning criminal: Rational choice perspectives of offending* (pp.72–82). New York: Springer-Verlag.
- Doherty, E. E., & Ensminger, M. E. (2013). Marriage and offending among a cohort of disadvantaged African Americans. *Journal of Research in Crime* & *Delinquency*, 50(1), 104–131. doi: 10.1177/0022427811423106
- Elliott, D. S., Huizinga, D., & Ageton, S. S. (1985). *Explaining delinquency and drug use*. Beverly Hills, CA: Sage.
- Elliott, D. S., Huizinga, D., & Menard, S. (1989). Multiple problem youth. New York: Springer-Verlag.
- Esbensen, F., & Elliott, D. S. (1994). Continuity and discontinuity in illicit drug use: Patterns and antecedents. *The Journal of Drug Issues*, 24, 75– 97.

Farrington, D. P., & Hawkins, J. D. (1991).
Predicting participation, early onset, and later persistence in officially recorded offending. *Criminal Behaviour and Mental Health*, 1, 1–33.

Farrington, D. P., & West, D. J. (1995). Effects of marriage, separation, and children on offending by adult males. In Z. Vlau & J. Hagan (Eds.), *Current perspectives on aging and the life cycle* (Vol. 4, pp. 249–281). Greenwich, CT: JAI Press.

Fillmore, K. M., Hartka, E., Johnstone, B. M., Leino, E. V., Motoyoshi, M., & Temple, M. T. (1991). A meta-analysis of life course variation in drinking. *British Journal of Addiction*, 86, 1221–1268. doi: 10.1111/j.1360-0443.1991.tb01702.x

Giordano, P. C., Cernkovich, S. A., & Rudolph, J. L. (2002). Gender, crime and desistance: Toward a theory of cognitive transformation. *American Journal of Sociology*, *107*(4), 990–1064. doi: 10.1007/978-1-4614-8930-6_3

Giordano, P. C, Seffrin, P. M., Manning, W., & Longmore, M. A. (2011). Parenthood and crime: The role of wantedness, relationships with partners, and SES. *Journal of Criminal Justice*, 39(5), 404–441. doi: 10.1016/j.jcrimjus.2011.05.006

Gottfredson. M. R., & Hirschi, T. (1990). *A general theory of crime*. Stanford, CA: Stanford University Press.

Graham, J., & Bowling, B. (1995). Young people and crime. London: Home Office Research Study 145.

Gunnison, E., & Mazerolle, P. (2007). Desistance from serious and not so serious crime: A comparison of psychosocial risk factors. *Criminal Justice Studies*, 20(3), 231–253. doi: 10.1080/14786010701617649

Gunnison, E., & McCartan, L. (2005). The role of different developmental experiences: A theoretical examination of female persistence. *Women and Criminal Justice*, *16*(3), 43–65. doi: 10.1300/J012v16n03_03

Hirschi, T. (1969). *Causes of delinquency*. Berkeley, CA: University of California Press.

Hirschi, T., & Gottfredson, M. R. (1983). Age and the explanation of crime. *American Journal of Sociology*, 89, 552–584. doi: 10.1086/227905

Horney, J. Osgood, D. W., & I. H. Marshall. (1995). Criminal careers in the short-term: Intraindividual variability in crime and its relation to local life circumstances. *American Sociological Review*, 60, 655–673. doi: 10.2307/2096316 Hughes, M. (1998). Turning points in the lives of young inner-city men forgoing destructive criminal behaviors: A qualitative study. *Social Work Research*, 22, 143–151. doi: 10.1093/swr/22.3.143

King, R. D., Massoglia, M., & MacMillan, R. (2007). The context of marriage and crime: Gender, the propensity to marry, and offending in early adulthood. *Criminology*, 45(1), 33–65. doi: 10.1111/j.1745-9125.2007.00071.x

Labouvie, E. (1996). Maturing out of substance use: Selection and self-correction. *Journal of Drug Issues*, 26, 457–476.

Lanza-Kaduce, L., Akers, R. L., Krohn, M. D., & Radosevich, M. (1984). Cessation of alcohol and drug use among adolescents: A social learning model. *Deviant Behavior*, 5, 79–96. doi: 10.1080/01639625.1984.9967633

Laub, J. H., & Sampson, R. J. (2001). Understanding desistance from crime. In M. Tonry (Ed.), *Crime* and justice: A review of research (pp. 1–69). Chicago, IL: The University of Chicago Press.

Laub, J. H., Nagin, D. S., & Sampson, R. J. (1998). Trajectories of change in criminal offending: Good marriages and the desistance process. *American Sociological Review*, 63, 225–238. doi: 10.2307/2657324

Leonard, K. E., & Homish, G. G. (2005). Change in marijuana use over the transition into marriage. *Journal of Drug Issues*, 35(2), 409–429. doi: 10.1177/002204260503500209

Loeber, R., & Le Blanc, M. (1990). Toward a developmental criminology. In M. Tonry and N. Morris (Eds.), *Crime and justice* (Vol. 12, pp. 375–437). Chicago: University of Chicago Press.

Loeber, R., Stouthamer-Loeber, M., Van Kammen, W., & Farrington, D. P. (1991). Initiation, escalation, and desistance in juvenile offending and their correlates. *Journal of Criminal Law and Criminology*, 82(1), 36–82. doi: 10.2307/1143789

Mazerolle, P. (1998). Gender, general strain, and delinquency: An empirical examination. *Justice Quarterly*, 15, 65–91. doi: 10.1080/07418829800093641

McIvor, G., Trotter, C., & Sheehan, R. (2009).
Women, resettlement, and desistance. *Probation Journal*, 56(4), 247–361. doi: 10.1177/0264550509346515

Meisenhelder, T. (1977). An exploratory study of exiting from criminal careers. *Criminology*, *15*, 319–334. doi: 10.1111/j.1745-9125.1977.tb00069.x

Michalsen, V. (2011). Mothering as a life course transition: Do women go straight for their children? *Journal of Offender Rehabilitation*, 50(6), 349–366. doi: 10.1080/10509674.2011.589887

Mischowitz, R. (1994). Desistance from a delinquent way of life? In E. G. M. Weitekamp, & H. J. Kerner (Eds.), *Cross-national longitudinal research on human development and criminal behavior* (pp. 303–327). Dordrecht, the Netherlands: Kluwer Academic Publishers.

Moffitt, T. (1993). Adolescence-limited and lifecourse-persistent antisocial behavior: A developmental taxonomy. *Psychological Review*, *100*(4), 674–701. doi: 10.1037/0033-295X.100.4.674

Opsal, T. (2012). 'Livin' on the straights': Identity, desistance, and work among women post-incarceration. *Sociological Inquiry*, 82(3), 378–403. doi: 10.1111/j.1475-682X.2012.00421.x

Ouimet, M., & LeBlanc, M. (1996). The role of life experiences in the continuation of the adult criminal career. *Criminal Behaviour & Mental Health*, 6(1), 73–97. doi: 10.1002/cbm.65

Paternoster, R., & Mazerolle, P. (1994). General strain theory and delinquency: A replication and extension. *Journal of Research in Crime and Delinquency*, 33, 235–263. doi: 10.1177/0022427894031003001

Patterson, G. R., & Yoerger, K. (1993).
Developmental models for delinquent behavior. In S. Hodgins (Ed.), *Mental disorder and crime* (pp. 140–172). Newbury Park, CA: Sage.

Pezzin, L. E. (1995). Earning prospects, matching effects, and the decision to terminate a criminal career. *Journal of Quantitative Criminology*, 11, 29–50. doi: 10.1007/BF02221299

Piquero, A. R. (2000). Assessing the relationships between gender, chronicity, seriousness, and offense skewness in criminal offending. *Journal* of Criminal Justice, 28, 103–115. doi: 10.1016/S0047-2352(99)00040-9

- Rand, A. (1987). Transitional life events and desistance from delinquency and crime. In M. E. Wolfgang, T. P. Thornberry, & R. M. Figlio (Eds.), *From boy to man, from delinquency to crime* (pp. 134–162). Chicago, IL: University of Chicago Press.
- Ragan, D. T., & Beaver, K. M. (2010). Chronic offenders: A life-course analysis of marijuana users. *Youth & Society*, 42(2), 174–198. doi: 10.1177/0044118X09351788

Rutter, M. (1994). Continuities, transitions, and turning points in development. In M. Rutter & D.
F. Hay (Eds.), *Development through life: A handbook for clinicians* (pp. 1–25). Oxford, UK: Blackwell Scientific Publications.

Sampson, R. J., & Laub, J. H. (1990). Crime and deviance over the life course: The salience of adult social bonds. *American Sociological Review*, 55, 609–627. doi: 10.2307/2095859

Sampson, R. J., & Laub, J. H. (1993). Crime in the making: Pathways and turning points through life. Cambridge, MA: Harvard University Press.

Sampson, R. J., & Laub, J. H. (1996). Socioeconomic achievement in the life course of disadvantaged men: Military service as a turning point, circa 1940–1965. *American Sociological Review*, 61, 347–367. doi: 10.2307/2096353

Schroeder, R. D., Giordano, P. C., & Cernkovich, S. A. (2010). Adult child-parent bonds and life course criminality. *Journal of Criminal Justice*, 38(4), 562–571.
doi: 10.1016/j.jcrimjus.2010.04.027

Shover, N. (1996). *Great pretenders: Pursuits and careers of persistent thieves*. Boulder, CO: Westview Press.

Shover, N., & Thompson, C. Y. (1992). Age, differential expectations, and crime desistance. *Criminology*, 30, 89–104. doi: 10.1111/j.1745-9125.1992.tb01094.x

Simons, R. L., Stewart, E., Gordon, L. C., Conger, R. D., & Elder, G. H. (2002). A test of lifecourse explanations for stability and change in antisocial behavior from adolescence to young adulthood. *Criminology*, 40 (2), 401–434. doi: 10.1111/j.1745-9125.2002.tb00961.x

Smith, D. A., & Paternoster, R. (1987). The gender gap in theories of deviance: Issues and evidence. *Journal of Research in Crime and Delinquency*, 24, 140–172. doi: 10.1177/0022427887024002004

- Sommers, I., Baskin, D. & Fagan, J. (1994). Getting out of the life: Crime desistance by female street offenders. *Deviant Behavior*, 15, 125–150. doi: 10.1080/01639625.1994.9967964
- Steffensmeier, D. J., & Ulmer, J. T. (2005). Confessions of a dying thief: Understanding criminal careers and illegal enterprise. New Brunswick, NJ: Transaction Publishers.
- Sutherland, E. (1947). *Principles of criminology* (4th ed.). Chicago, IL: J.B. Lippincott Co.
- Sweeten, G., Piquero, A., & Steinberg, L. (2013). Age and the explanation of crime, revisited. *Journal of Youth & Adolescence*, 42(6), 921–938. doi: 10.1007/s10964-013-9926-4
- Temple, M. T., Fillmore, K. M., Hartka, E., Johnstone, B. M., Leino, E. V., & Motoyoshi, M. (1991). A meta-analysis of change in marital and employment status as predictors of Alcohol consumption on a typical occasion. *British Journal of Addiction*, 86, 1269–1281.doi: 10.1111/j.1360-0443.1991.tb01703.x
- Thompson, M., & Petrovic, M. (2009). Gendered transitions: Within-person changes in employment, family, and illicit drug use. *Journal* of Research in Crime and Delinquency, 46(3), 377–408. doi: 10.1177/0022427809335172
- Uggen, C., & I. Piliavin. (1998). Asymmetrical causation and criminal desistance. *Journal of Criminal Law and Criminology*, 88(4), 1399– 1422. doi: 10.2307/1144260
- Uggen, C., & Kruttschnitt, C. (1998). Crime in the breaking: Gender differences in desistance. *Law* and Society Review, 32, 339–366. doi: 10.2307/827766
- Varriale, J. A. (2008). Female gang members and desistance: Pregnancy as a possible exit strategy? *Journal of Gang Research*, 15(4), 35–64.
- Warr, M. (1993). Age, peers, and delinquency. *Criminology*, *31*, 17–40. doi: 10.1111/j.1745-9125.1993.tb01120.x
- Warr, M. (1998). Life-course transitions and desistance from crime. *Criminology*, 36, 183– 216. doi: 10.1111/j.1745-9125.1998.tb01246.x
- Warr, M. (2002). Companions in crime: The social aspects of criminal conduct. New York, NY: Cambridge University Press.
- Weiner, N. (1989). Violent criminal careers and violent criminals. In N. Weiner and M. E.
 Wolfgang (Eds.), *Violent crime, violent criminals* (pp. 35–138). Newbury Park, CA: Sage.

White, H. R., & Bates, M. E. (1995). Cessation from cocaine use. *Addiction*, 90, 947–957. doi: 10.1046/j.1360-0443.1995.9079477.x

- White, H. R., Lee, C., Mun, E. Y., & Loeber, R. (2012). Developmental patterns of alcohol use in relation to the persistence and desistance of serious violent offending among African American and Caucasian young men. *Criminology*, 50(2), 391–342. doi: 10.1111/j.1745-9125.2011.00263.x
- Wiecko, F. M. (2014). Late-onset offending: Fact or fiction. International Journal of Offender Therapy & Comparative Criminology, 58(1), 107–129. doi: 10.1177/0306624X12458503
- Yamaguchi, K., & Kandel, D. B. (1985). On the resolution of role incompatibility: A life history analysis of family roles and marijuana use. *American Journal of Sociology*, 90, 1284-1325. doi: 10.1086/228211
- Zara, G., & Farrington, D. (2009). Childhood and adolescent predictors of late onset criminal careers. *Journal of Youth & Adolescence, 38*(3), 287–300. doi: 10.1007/s10964-008-9350-3

About the Author

Elaine Gunnison is an Associate Professor and Graduate Director in the Criminal Justice Department at Seattle University. She received her Ph.D. in Criminal Justice from the University of Cincinnati in 2001 with a specialization in life course criminology, female offending, and corrections. Her research interests include understanding female offending patterns such as desistance and persistence, the applicability of criminological theory to females, and offender reentry. She recently co-authored a book entitled, *Offender Reentry: Beyond Crime and Punishment* (Lynne Rienner). Her research has been published in various outlets including *Crime and Delinquency, Criminal Justice Studies, Federal Probation,* and *Women and Criminal Justice.*

Appendix: Logistic Regressions for Females and Males

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6	Model 7	Model 8	Model 9
Control Variables									
Age	$.1441^{**}$.0697	.1463**	$.1523^{**}$.1479**	$.1510^{**}$	$.1503^{**}$.1128*	$.1481^{**}$
Race	.0109	.8845	.0503	.0374	.0475	3459	0128	.0587	.0470
Self-Control									
Delinquent Disposition		2139							
Social Control									
Employed (1981)			.0307						
Employed (1982)				1812					
Employed (1983)					.0082				
Employment Attachment						.1879			
Religious Attachment							$.3340^{**}$		
Marital Status (1983)								.6144**	
Transitional Life Events									

Wave 6 Predictors of Desistance/Persistence from General Delinquency, Females, n=335

** p < .05* p < .10

Pregnant

-.0015

GUNNISON

Appendix: Logistic Regressions for Females and Males

Wave 6 Predictors of Desistance/Persistence from General Delinquency, Females, n=335 (continued)

	Model 10	Model 11	Model 12	Model 13	Model 14	Model 15	Model 16	Model 17	Model 18	Model 19	Model 20	Model 21
Control Variables												
Age	$.1481^{**}$	$.1526^{**}$.1423**	$.1549^{**}$	$.1562^{**}$	$.1630^{**}$	$.1333^{*}$.1384**	$.1640^{**}$	$.1537^{**}$	$.1397^{**}$	$.1405^{**}$
Race	.1927	.4658	.1583	.1414	.1059	.0822	.1647	.0549	0060	0556	0341	.0084
Differential Association/												
Social Learning												
Delinquent Peer Exposure	0400											
Peer Attachment		1479										
Strain												
Neighborhood Problems			1131*									
Negative Life Events-Parents (1981)				2395								
Negative Life Events-Parents (1982)					.0376							
Negative Life Events-Parents (1983)						.4049*						
Negative Relations with Adults							2349					
Deterrence/Rational Choice												
Certainty of Punishment								$.2028^{**}$				
Severity of Punishment									$.2236^{**}$			
Drug/Alcohol Use												
Use-1981										2004**		
Use-1982											1228	
Use-1983												0933

** p < .05* p < .10

DESISTANCE FROM CRIMINAL OFFENDING

Appendix: Logistic Regressions for Females and Males

Wave 6 Predictors of Desistance/Persistence from General Delinquency, Males, n=452

	Model	Model	Model	Model	Model	Model	Model	Model	Model	Model	Model
	1	2	3	4	5	6	7	8	9	10	11
Control Variables											
Age	$.1409^{**}$	$.1604^{**}$.1035	$.1349^{**}$	$.1336^{**}$	$.1358^{**}$	$.1485^{**}$	$.1404^{**}$	$.1246^{**}$.0828	.1528**
Race	0233	.0082	1774	.0934	.1165	.1074	.1386	.0442	.0994	.1899	.2830
Social Control											
Moral Belief Index		.3622**									
Family Attachment			.9892*								
Employed (1981)				.0442							
Employed (1982)					.1320						
Employed (1983)						.1315					
Employment Attachment							.0800				
Religious Attachment								.3054**			
Marital Status (1983)									.2073		
Differential Association/											
Social Learning											
Delinquent Peer Exposure										2126**	
Peer Attachment											.1442

** p < .05* p < .10 GUNNISON

Appendix: Logistic Regressions for Females and Males

Wave 6 Predictors of Desistance/Persistence from General Delinquency, Males, n=452 (continued)

	Model 12	Model 13	Model 14	Model 15	Model 16	Model 17	Model 18	Model 19	Model 20	Model 21
Control Variables										
Age	$.1446^{**}$	$.1511^{**}$	$.1478^{**}$.1491**	.1195*	$.1409^{**}$.1515**	$.1648^{**}$	$.1530^{**}$	$.1364^{**}$
Race	.1549	.0600	.0519	.0536	.5975*	8660.	0419	.0398	.0453	.0375
Strain										
Neighborhood Problems	0759									
Negative Life Events-Parents (1981)		0656								
Negative Life Events-Parents (1982)			1376							
Negative Life Events-Parents (1983)				0726						
Negative Relations with Adults					4731**					
Deterrence/Rational Choice										
Certainty of Punishment						.0485				
Severity of Punishment							.1168			
Drug/Alcohol Use										
Use-1981								1749**		
Use-1982									1519*	
Use-1983										1956**

** p < .05* p < .10

ENDNOTES

- ³ Only respondents with data across all 7 waves were utilized for this analysis.
- ⁴ This part of the research is limited to the sub-sample of offenders who have had children over the sampling period.
- ⁵ With the exception of those items which overlap with their "index offenses" scale or are considered serious offenses. Items included: bought stolen goods, carried a hidden weapon, stole something worth less than \$5, prostitution, sold marijuana, sold hard drugs, disorderly conduct, joyriding, and stole things worth between \$5-50.
- ⁶ Due to the relatively smaller sample size for late onseters and conformers, for purposes of the logistic regression analysis, desisters and persisters were directly compared in the logit model. Hence, the dependent variable was coded as 0=persister and 1=desister. Note: this reduced the overall female sample size to 335 and male sample size to 452.
- ⁷ The predictor variables used to derive these models were not standardized prior to inclusion in each model. Thus, the variables maintain their original scaling but comparing relative strengths of coefficients within models should not be done.
- ⁸ Variables included in the full model were those that were statistically significant (p<.10) in models 1-21 of the Appendix. In addition, if any variable was selected for the full model that dropped the sample size below 100, it was excluded. Moreover, two predictors from the social control tradition and two predictors from the strain theoretical tradition were significant, and, in each case, the predictor with the higher Wald statistic value was chosen for inclusion in the full model.
- ⁹ Variables included in the full model were those that were statistically significant (p<.10) in models 1-21 of the Appendix. In addition, if any variable was selected for the full model that dropped the sample size below 100, it was excluded. Moreover, two predictors from the social control tradition and three predictors from the drug and alcohol use category were significant, and, in each case, the predictor with the higher Wald statistic value was chosen for inclusion in the full model.

¹ The 635 adolescents selected who did not participate in the first wave can be attributed to parent refusal, youth refusal, or the inability to make contact with the potential subject (Elliott et al., 1985).

² Of the original 1,725 respondents, 1,530 had data across all seven waves. However, 13 additional respondents were omitted due to a computer error which rendered those cases unusable bringing the final sample size to 1,517.