

Public Perceptions Matter
A Procedural Justice Study Examining an Arrestee Population

by

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ABSTRACT

Research has shown that the manner in which people are treated in their interactions with agents of the criminal justice system matters. People expect criminal justice officials to treat them fairly and with honesty and respect, which is the basis for procedural justice. When people are treated in a procedurally just and equitable manner they will view the system as legitimate and will be more likely to voluntarily comply and cooperate with legal system directives. People who have personal or vicarious experiences of unfair or unjust interactions with the legal system tend to view the system as less legitimate and are less likely to comply and cooperate when they have contact with representatives of the system.

This study examines a random sample of 337 arrestees in Maricopa County, Arizona who have been interviewed as a part of the Arizona Arrestee Reporting Information Network. Descriptive statistics and regression analysis are used to examine views of the procedural justice experienced by arrestees during arrest, perceptions of police legitimacy by arrestees, voluntary compliance to the law, and voluntary cooperation with police. Results of the study show that perceptions of legitimacy work through procedural justice, and that procedurally just interactions with police mediate racial effects on views of legitimacy. Views of procedural justice and legitimacy increase cooperation. No variables in this study were significantly related to compliance.

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Chapter 1

INTRODUCTION

Criminologists are interested in studying various aspects of crime and the criminal justice system. They have developed a litany of theories in an effort to explain criminal behavior. One question germane to understanding criminal justice processes is why do people obey the law? There is no simple answer to this question. Crime is a complex problem with no simple solution. The bulk of criminologists' efforts have focused on ecological factors that are seen as the root cause of crime and deviance. Common themes that are associated with crime are ecological factors such as concentrated disadvantage, deviant peer groups, unemployment, a weakening of social bonds, among other things. What have not been given much attention to by criminologists until recently are the pro-social and criminogenic behaviors of justice system actors. It seems antithetical that the justice system could be a source of crime because the purpose of such a system, and the formal sanctions they impose, is to garner compliance to and respect for the law. However, a growing body of empirical research suggests that it is entirely possible, perhaps even a widespread phenomenon (Tyler, 1990; Sherman, 1993).

To some degree, just about everybody violates the law (Tyler, 1990). It is rare to find someone who has never driven over the speed limit, littered, or experimented with illegal drugs. However, most people do not engage in serious crimes that own the connotation of "criminal." We typically do not call speeders criminals although they are breaking the law. The same could be argued about

those who recreationally use narcotics, or minors drinking alcohol. To identify these individuals as “criminals” would be misleading. Even police officers are occasionally guilty of driving under the influence of alcohol. In most cases, they will not lose their job because of a DUI. For more serious crimes such as burglary, robbery, arson, and homicide, though, people generally obey the law (Tyler,1990). Only a small number of people commit serious crimes. So, a question criminologists are concerned with is why almost everybody obeys the law.

It seems reasonable that the threat of sanctions and punishment is why people obey the law. This line of thinking is certainly politically popular. There are alternative perspectives, however. Punishment coming from the justice system can have conflicting and sometimes undesired effects. Instead of deterrence, punishment can incite future criminality with some people (Sherman, 1993). In general, the goals of the justice system are to punish wrongdoers for their illegal behavior, provide retribution for victims, and to discourage people from engaging in future crime (Sherman, 1993). The system is there to enact policies that can accomplish these goals as efficiently and effectively as possible. As noted earlier, the way criminal justice system actors behave when dealing with the public may have noncompliant, uncooperative, and criminogenic effects, which may be counterproductive from a public policy standpoint. The police, the courts, and the correctional system serve as the means of formal social control in this country. How people interact with and perceive these institutions can influence future behavior by the public.

People expect to be treated fairly and respectfully, and when they are not feelings of anger and defiance are potentially harbored. In the case of an interaction between the public and the police, a person may feel that the interaction was unfair or may have led to an unfair outcome. For example, the individual may feel that the officer did not take the time to listen to their version of the story and that the officer did not value their opinions and perspectives. In such a case, the individual may over time develop ill feelings toward that officer and other authority figures within the criminal justice system. This may have the effect of spoiling the individual's views of that authority's legitimacy to enforce the law. A possible result may be future noncompliance to the law and an unwillingness to cooperate with the police (Tyler, 1990). This behavioral response is tightly linked to the concept of procedural justice. Tyler's (1990) thorough investigation of Chicago respondents furthers and refines the concept of procedural justice empirically where he concludes that the main reason why people obey the law is based on how people are treated by authorities. A detailed discussion of it is to follow later.

There is a theoretical chain of causal events here that begins with a personal or vicarious negative interaction with an authority figure and concludes with noncompliance to authority figures in the future. Interactions with authority figures form a person's perception of those authority figures. Those perceptions influence an individual's views of official's legitimacy in the capacity as an authority. If the authority figures are not viewed as legitimate in the execution of their power, then there may be no reason for an individual to abide by their rules.

A procedurally just contact is likely to inspire views of legitimacy which may contribute to voluntary compliance and cooperation with the law. A procedurally unjust contact may lower views of legitimacy which may not garner compliance and cooperation with the law.

This thesis will first discuss perceptions of the United States criminal justice system in the second chapter. The third chapter will discuss the concepts of procedural justice and the empirical status of the theory. One goal of this thesis is to demonstrate that perceptions of the criminal justice system matter when it comes to inducing law abiding and unlawful behavior from the public. Another goal of the paper is to further the extant knowledge on factors contributing to views of procedural justice and legitimacy, compliance and cooperation with the law.

Chapter four is the methodology section to this study. Research on procedural justice has typically drawn samples from the general population. Missing from the current body of research are studies using samples drawn from arrestee populations. This research is important because it aims to take a step toward filling that gap by investigating whether or not prior findings on procedural justice extend to an arrestee population. The data used in this study come from a sample of recently arrested individuals in Maricopa County, Arizona. Do arrestees share attitudes about procedural justice with the general population? What predictors are associated with forming those attitudes? The data will be used to answer these questions. Analyses will identify factors contributing to views of procedural justice and legitimacy, compliance and

cooperation with the law within the arrestee population in Maricopa County, Arizona. The last chapter provides a discussion of the salient findings offered by this investigation and consider some implications relevant to procedural justice issues.

Chapter 2

PERCEPTIONS OF THE CRIMINAL JUSTICE SYSTEM

An argument being made in this paper is that citizens' perceptions matter and have a direct influence on their subsequent behavior and those who perceive the system in high regard will be more likely to comply with the rules of that system. It is argued on the other hand that those who have negative perceptions of the system will be less inclined to comply with system rules and be less likely to cooperate with system agents. Common themes when measuring attitudes about the legal system and procedural justice are fairness and respect. Questions and statements about honesty, justice, fairness and respect are used consistently when measuring attitudes toward the legal system and toward personal or vicarious experiences of procedural justice. Studies of police perceptions and police support have similar measures to those used in studies of police related procedural justice and legitimacy. In fact, they could act as proxies for one another since the two topics are operationalized similarly. A discussion on the dynamics of perceptions of the criminal justice system in the United States is warranted as a starting point.

Perceptions and attitudes about the criminal justice system are an interesting subject for empirical investigation. They vary across space and time and are impacted by a variety of legal and extralegal factors. Events that occur in one part of the country may not affect public opinions in another part of the country. Attitudes towards the legal system and government authority also tend to change over time. Well-publicized events involving the miscarriage of justice

can negatively affect the public's attitudes towards the system, but over time attitudes tend to return to their previous levels before the event. There have been many clearly demonstrated incidents of criminal injustice in recent years, including excessive use of force and racial bias. Some of the most salient have occurred in Los Angeles and New York City. The incidents discussed here concern police brutality and the abuse of authority.

In 1979 two officers of the Los Angeles Police Department shot and killed an African-American woman named Eulia Love. She had allegedly threatened the officers with a knife. According to public opinion polls taken after the shooting, 51% of Caucasians, 66% of Hispanics, and 81% of African-Americans felt that the officers were unjustified in using lethal force. The polls also indicated that police approval ratings sharply declined within the minority community (Tuch and Weitzer, 1997). In spring of 1991, the country saw the brutal beating of Rodney King at the hands of four Caucasian police officers. It was almost universally believed by the public that officers used excessive force dealing with Rodney King (Tuch and Weitzer, 1997). Demonstrations and later riots ensued after the officers involved in the beating were exonerated in criminal court. After the incident, the approval ratings for the LAPD within the African-American community bottomed out at 14% (Tuch and Weitzer, 1997). Several institutional changes occurred within the leadership of the police department as a result of the incident. It took almost four years until approval ratings of the LAPD reached pre-Rodney King levels. This case had significant staying power

in terms of the public's perception of the police department; however, the staying power was much greater for African-Americans than for Caucasians.

In 1996, two Mexican immigrants were severely beaten by Riverside County sheriff's officers. The videotape of the beatings went viral. Again, approval ratings for law enforcement in the Los Angeles area plummeted, especially in the case of Hispanics and African-Americans. These widely publicized incidents are no doubt a source for the public's criticism and skepticism of law enforcement, and the effect's significance is correlated with ethnicity. Tuch and Weitzer (1997) show that in 1997, 75% of African-Americans viewed police brutality as commonplace, whereas only 38% of Caucasians thought so. Hispanics tend to score between African-Americans and Caucasians in their views of police brutality and police approval ratings.

Widely publicized events of criminal injustice affect attitudes about the system negatively at local and national levels, as evidenced by national decline in police approval after these incidents in Los Angeles. Of course, not all police misconduct and excessive use of force occurs in Los Angeles. The New York Police Department shooting of Amadou Diallo, the sexual assault of Abner Louima in a NYPD precinct station, and the shooting of Sean Bell contributed to large scale public mistrust of the police on the East Coast (Weitzer, 2002; Kane and White, 2009). Race most certainly plays a role in the level of approval and the staying power of the event. In turn, lower approval ratings mean lower confidence in the police and the polls show that minorities have had lower levels of confidence and trust in the police historically (Tuch and Weitzer, 1997).

ETHNICITY AND CLASS

There are many ways to measure perceptions of the criminal justice system. Perceptions can range from positive to negative or somewhere in between, but for the purpose of this paper, negative perceptions of police authority are to be the focus. Criminal injustice occurs when agents of the legal system behave unjustly (this includes abuse of power, unjustified use of force, racial biased policing, etc.) and has the tendency to impact one's perceptions of the justice system negatively, as well as those visible representatives of the system. Research has consistently shown that minorities, particularly African-Americans, view the legal system as biased against minority communities, especially as it related to the most visible agents of the system, the police (Brooks and Jeon-Slaughter, 2001). Using data collected from a study under the direction of the National Center for State Courts, and for the Law Enforcement Assistance Administration of the U.S. Department of Justice, Hagan and Albonetti (1982) found that race is the most persistent and striking influence on the perception of criminal injustice. Police and law enforcement contacts had the largest influence on negative perceptions in their study. Contacts with the courts and other system actors did not affect negative perceptions as much as contacts with law enforcement, but were still a source of perceived injustices. African-Americans were much more likely than Caucasians to perceive criminal injustice as interacting at all levels of criminal justice system (Hagan and Albonetti, 1982). Also found in the 1982 study, social class affects perceptions of the legal system. When controlling for race and ethnicity, the unemployed and the poor are more

likely to recognize and perceive behaviors as criminal injustices. A noteworthy finding in the study was the manner in which class structure interacts with race. As African-Americans move up in class standing, their views of criminal injustice become more varied from that of their Caucasian counterparts and well-off African-Americans perceive more injustice in our legal system than Caucasians (Hagan and Albonetti, 1982). This may be because affluent African-Americans spend more time in areas dominated by Caucasians where they may be scrutinized more carefully. Affluence may also influence expectations in how well-off African-Americans are treated by police.

Another recent study by the National Center for State Courts further substantiates the above claim. For African-Americans, as income increases the level of trust in the legal system declines (Brooks and Jeon-Slaughter, 2001). Well to do African-Americans will perceive more criminal injustice than their Caucasian peers and under-class African-Americans. Higher income African-Americans have been shown to be skeptical of the courts' abilities to distribute justice fairly and equitably to African-Americans as compared to Caucasians, and African-Americans in the highest income bracket are about twice as likely as lower income African-Americans to view the legal system as unfair (Brooks, 2000; Brooks and Jeon-Slaughter, 2001). Middle and upper-class African-Americans are more likely than Caucasians and poor African-Americans to view not only the legal system, but institutions within our society as being racist, and opine that the American dream is an unattainable myth (Hochschild, 1995). Upper-class African-Americans also tend to feel that their ethnicity is

underrepresented in the political arena (Brown, 1994). They also perceive greater injustice in education, housing, and health care (Hagan, Shedd, and Payne, 2005). There is a large amount of evidence supporting the idea that African-Americans, typically better off ones, are more likely than Caucasians and poor African-Americans to view many of our country's institutions as unjust. Higher levels of education may increase African-American citizens' exposure and knowledge of incidents involving prejudicial treatment and the miscarriage of justice.

African-Americans, as noted earlier, have less favorable views of the police than other ethnic groups. Brunson (2005) suggests that harassment by the police is partially responsible for such views. African-American youths are suspected, stopped, questioned, watched, and held by police at a higher rate than other ethnic groups therefore contributing the perception of being harassed by the police on the basis of skin color (Brunson, 2005). The study showed that 83% of respondents (all African-American) reported having direct experience of police harassment. More than 90% knew someone who had been a harassed by the police. Many respondents complained about the abusive language and physically intrusive searches officers used in the contact. A quarter of the sample in the study reported that they have experienced a contact with police that went beyond harassment into the arena of aggression without proper reasons for the conduct. Almost half of the respondents said they knew of someone who had been a victim of unwarranted aggressive policing practices (Brunson, 2005).

The disparity in perceptions of criminal injustice is not limited to just African-Americans versus Caucasians because the demographic uptick in

Hispanics is reshaping the population distribution in American cities (Sampson and Lauristen, 1997). Perceived injustice exists within these other ethnic categories as well. Minority groups in general have claimed that they are the target of disproportionate physical and verbal abuse, and receive inadequate protection and service from law enforcement (Radelet, 1980), while at the same time the police tend to think they are unduly blamed by minority communities as a source of oppression. The Hispanic population is another minority group that deserves special attention because the Hispanic population is growing. A report by the United States Commission on Civil Rights noted that “Mexican-American citizens are subject to unduly harsh treatment by law enforcement officers... they are often arrested on insufficient grounds, receive physical and verbal abuse, and penalties which are disproportionately severe” (Carter, 1985).

In a study of Hispanic respondents in Texas, Carter (1985) found that those Hispanics who had recent contact with police reported that less than half of the officers had a favorable attitude, and that one-fifth of the officers were reported to have disrespectful attitudes. The way that officers conduct themselves is related to police job performance ratings. When rating police performance, the amount of police contacts has a direct impact. The police agencies that Hispanics had more contact with received lower performance ratings (Carter, 1985). Other agencies, like highway patrol, which have lower amounts of contact with the public tended to have better performance ratings from the Hispanic population in the Texas study. The public’s attitude toward the local police may be relatively favorable until they come in contact with the police (Carter, 1985).

NEGATIVE EXPERIENCES AND DISORGANIZATION

Other studies have validated the premise that contact with the police tends to drive an individual's view of the police downward (Hagan, Shedd, and Payne, 2005). One reason that contact with the police tends to drive down police performance ratings is the inadequate performance of the officer coupled with the unrealistic public expectations of the police. Hagan, Shedd, and Payne (2005) found that Hispanics felt that they were under protected by the police which led to an increase in the fear of crime. Fear of crime is also associated with police performance ratings. As the public perceives increases in the crime rate, fear of crime will also tend to increase. This effect tends to be mediated by local news coverage of crime increases (Chiricos, 2004). Inevitably, the threat of being victimized will create a demand for increased protection from police and consequently increase the expectations. Being a victim of a crime is related to police perceptions as well, and if someone has been a victim of a crime then they are more likely to view police services as inadequate (Hagan, Shedd, and Payne, 2005).

Non-reporting of crimes is a reality in our legal system (Hagan, Shedd, and Payne, 2005). A notable and consistent reason why people do not report crime victimization experiences is because they feel that there is little or nothing the police can do to resolve the incident. Hagan, Shedd, and Payne (2005) found that Hispanics do not report crimes because their previous experience dealing with the police was a negative experience, and the feeling that the police were unable to handle the situation effectively. The study suggests that police-Hispanic

relations ought to be improved; in fact, Hispanics reported that when an officer was introduced into a situation, the officer often made the situation worse.

Like African-Americans, better educated Hispanics have less confidence in the legal system to distribute justice evenhandedly both in terms of procedure and outcomes. Carter (1985) suggests that an absence of communication and a lack of cultural understanding between the groups contribute to the poor relationship. When considering the attitudes toward police, race must be taken into consideration. Race is one of the most important variables of which researchers must take note (Decker, 1981).

A study of Chicago youths shows that even younger individuals perceive a disparity in the justice system (Hagan, Shedd, and Payne, 2005). African-American and Hispanic youths in the study view members of their own ethnicity as being more likely to be stopped and questioned unfairly by the police. The study reports that police come in to contact with African-American youth much more frequently than Hispanic youth, which in turn come in contact with the police much more than Caucasian youth. However, low socio-economic status may explain much of the variation in police contacts within all ethnic categories. An interesting finding in the above study is that perceptions of criminal injustice actually increase as the level of Caucasian student integration increases. This suggests that as the level of Caucasian students increase, minority students perceive that they are treated more unfairly by authority figures as compared to the other Caucasian students. Youth perceptions are important because views of

society, justice, and politics are formed at a young age and persist into adulthood (Hagan, Shedd, and Payne, 2005).

It has been found that living in an urban area is associated with more negative perceptions of the legal system. Those living in the inner-city and areas of poverty are more likely to experience or perceive criminal injustices than their more rural area dwelling counterparts regardless of ethnicity (Brooks and Jeon-Slaughter, 2001; Hagan and Albonetti, 1982). Although the center-cities in the U.S. are still largely comprised of minorities, race alone does not account for all the negative attitudes toward the legal system. Reports of unethical police practices are widespread in inner-city areas and ghetto neighborhoods (Roberts and Stalans, 1997). Chambliss (1997) shows that in these heavily populated urban areas where there are large concentrations of disadvantaged minorities, police surveillance is more intense and pervasive than in ethnic majority, suburban neighborhoods, thus contributing to increased levels of perceived injustice and higher arrest rates among minorities.

One may ask why there is such a disparity in legal cynicism within racial categories. It likely cannot be explained by subcultural tolerance of criminality. Some have argued that minorities are more tolerant of crime and violence within the context of disorganized neighborhoods, and that police intervention is usually seen as harassment. Sampson and Bartusch (1998) found that this is not the case and that minority citizens actually have less tolerance to crime than Caucasians in certain cases. It just happens that areas of concentrated disadvantage which are rife with crime and violence contain a larger proportion of minorities. The

minorities in such areas are victims of their surrounding environment. Given the dubious history between politically dominant Caucasians and minority communities in the past, it certainly may be understandable that minorities harbor resentment. Above this though, it should be noted that elements of historical racism still exist in the criminal justice system. Minorities are more likely to receive the death penalty, be shot by police, get sentenced to longer periods of time, be victimized, have adversarial contacts with police, and be tried as an adult when under the age of 18 (Tuch and Weitzer, 1997; Petersilia, 1983, Tonry, 2004, and Unnever, 2008).

African-Americans, particularly youth, and Hispanics are differentially at risk of justice system surveillance compared to Caucasians, and where these folks live plays a vital role in their contact and exposure to the legal system (Hagan, Shedd, and Payne, 2005). Even outside of the criminal justice system there are disparities in treatment. African-Americans are paid less given the same educational level as Caucasians (Wright, 1978). It follows that better educated minorities would be aware of the racial disparities that plague our society. As noted earlier, more educated minorities are more cynical of the legal system and perceive higher levels of criminal injustice. For policy makers to scoff at the ethnic disparity in perceptions about the legal system would be imprudent. It certainly makes sense that minorities have an increased level of cynicism towards the legal system and an increased level of perceived injustice. They tend to bear the brunt of experiencing more injustices, and any study of perceived injustices

within the legal system without ethnic and class variables would be incorrectly specified.

Chapter 3

PROCEDURAL JUSTICE, LEGITIMACY, COMPLIANCE, AND COOPERATION

Public authorities and officials should care about how they interact with the public they serve. A growing body of empirical research suggests that the manner in which people are treated by authorities matters and directly impacts their outlook on local authority figures. In order to get the public to voluntarily comply with authority's directives, the public needs to perceive those authorities as legitimate and serving the needs of the public. That is why perception matters. Perceptions of legitimacy are formed by the personal or vicarious interactions with authorities. Procedurally fair interactions will form views of legitimacy while procedurally unfair interactions will not (Tyler, 1990; Tyler, 2003; Kane, 2005; Reisig and Mesko, 2009).

When the public views those authority figures as legitimate, they will be more inclined to voluntarily comply with the authority's directives. Voluntary compliance is much more desirable than deterrence-based compliance, which is founded on fear. Fewer resources are required to get people to comply with laws when compliance is voluntary. Deterrence-based perspectives, those based on the threat of punishment and the rewards of compliance, take a greater amount of resources. Salaries, prisons, and court buildings all take public tax money to maintain. In short, the system runs more efficiently when people believe in the moral validity of public agents and their policies and procedures.

The theory of procedural justice has existed for decades and has been used to explain behavior in sociology, psychology, politics, and economics. It was initially made popular by Thibaut and Walker (1975). Originally, the theory focused on outcomes. If the outcome of the interaction was favorable to a party during a social interaction then that party would view that interaction as fair. Having control in the decision making process was also seen as important. According to the theory, if citizens feel that they have some control in the decisions about which an outcome is the result, the process will be viewed as fair. Not wanting the negative outcome of jail, prison, or fines, people were theorized to be deterred from crime through tough sanctions. This instrumental approach of deterrence has dominated criminal justice policy for decades. However, the empirical evidence has not supported the deterrence component of the theory's claims very well.

THE CURRENT STATE OF PROCEDURAL JUSTICE THEORY

Procedural justice has more recently been furthered by the seminal work of Tyler (1990). In his thorough study of Chicago residents, he advocated for a different approach in understanding procedural justice. Instead of favorable outcomes being the primary focus, Tyler suggests that it is how people are treated in their immediate interaction with authorities that matters most. This approach focuses on people's views of what behavior is just and moral, and not people's self-interest in the outcomes they receive. This normative paradigm states that people comply with the law voluntarily out of an obligation or duty to the moral rules of law and to the legitimate authorities rightfully creating and enforcing

those laws. The moral appropriateness of laws is not consistent for all laws, however. Some laws viewed by certain groups of people have no moral implication, like in some cases the use of illicit drugs. Many people use drugs recreationally, but do not steal. Stealing is viewed as immoral and so people are morally obligated to obey laws against stealing. Smoking marijuana on the other hand, does not have such a clear immoral implication and so a larger segment of society violates the law and smokes the drug regardless of the risk of legal sanctions.

During interactions with police or with court officials, people want to be treated fairly to a greater degree than they want a favorable outcome. People judge authorities on the normative aspects of the interaction rather than the outcome of the interaction itself. If the processes of that interaction are judged to be fair, honest, and respectful by the public, then the authority figures will be regarded more highly in terms of legitimacy. This does not mean that outcomes are irrelevant. Outcomes do matter. However, people expect the outcomes to be commensurately fair as well. The punishment should be commensurate to the crime, and the sanction should be consistent across space and time. Punishments should be distributed equitably, and with concern for the individual's well-being. If one person was fined one thousand dollars for speeding, while another person was only fined only one hundred dollars for the same speeding ticket, the punishment was distributed unfairly. The first person would more likely harbor ill feelings towards the authorities in such a case, thus affecting the authority's legitimacy in that person's mind.

People want to experience neutrality, honesty, fairness, politeness, and a respect for their rights when they interact with authorities. They want to have their voice heard and to be considered a valuable member of society. This is what procedural justice means, per se. A procedurally just interaction will create less bias, and judgments will be perceived as being made fairly and honestly. Fairness and honesty are the foundation for quality decision making in a procedurally just interaction. All parties must be allowed representation, and have their turn to explain their side of the story. If errors are made those errors must be correctable in a procedurally just interaction. These normative aspects of procedural justice will affect the perceptions of legitimacy within the public. According to Tyler (1990), procedural justice is the basis of legitimacy. Working through legitimacy, the public voluntarily obeys the law and respects government agents. An authority whom is viewed as legitimate has a perceived right to dictate rules and regulations onto citizens, and because authority figures are limiting the behaviors and freedoms available to the public they need to be viewed as legitimate. Authorities without legitimacy will have a difficult time regulating public behavior and controlling disorder. Legitimacy is important for cooperation and compliance with the law as people are likely to cooperate with legitimate authorities. Cooperation means to provide police with information, report crimes and suspicious behavior, and do as instructed by government agents among other things. Compliance means to voluntarily follow the laws and directives established by legitimate authorities.

This normative perspective of procedural justice is validated by analysis of the data collected in the Chicago study (Tyler, 1990). The study empirically shows that the procedures undertaken during an interaction with authorities form perceptions of legitimacy, and that as levels of legitimacy increase, so do levels of compliance. This relationship exists regardless of social and demographic characteristics, and regardless of outcomes relating to distributive justice (Tyler, 1990). The favorability of outcomes is not that important of a factor contributing to legitimacy while on the other hand procedural justice is the most important factor when forming perceptions of legitimacy (Tyler, 1990). Even in the case of an undesirable outcome, such as an arrest or prison sentence, if the social interaction and process was procedurally just, the parties involved will be more inclined to comply with the law in the future than if an outcome was achieved through procedurally unjust means (Tyler, 1990).

Drawing on this concept of legitimacy, it is much easier for “legitimate” authorities to influence behavior than for “feared” authorities to influence behavior through deterrence. Tyler’s conclusion from his 1990 work is that people mainly obey the law because they believe that the law and the system are legitimate, not because of the threat of punishment. Lawmakers and criminal justice agents would do well by trying to make the system as legitimate as possible in the eyes of the public instead of using the fear of sanctions.

THE EMPIRICAL STATUS OF PROCEDURAL JUSTICE

Since Tyler’s early work (1990), a substantial amount of empirical research has been produced on procedural justice and legitimacy, and the

theoretical concept has accrued significant empirical support. A police agency will benefit from being viewed as legitimate because as studies have demonstrated the police cannot successfully control crime and disorder without the cooperation of the public. When legitimacy is low, the public's willingness to cooperate with police is less likely (Sampson, Raudenbush, and Earls, 1997). Axelrod (1984) suggests that cooperation is more likely when both parties, the public and the authorities, cooperate with each other, but when one party introduces unnecessary competition for dominance within the interaction, the other party will also respond in an adversarial manner. He shows that it is more beneficial to individuals in authoritarian roles like the police, and to the public, to elicit compliance and cooperation through procedural justice rather than through the often-alienating deterrence strategies.

Mandatory arrest policies for domestic violence have been in place across the nation in effort to deter domestic householders from engaging in domestic violence in the future. The idea is that the unpleasant experience of being arrested will act as a greater deterrent than a simple warning from a police officer. To a large extent, these policies stem from a series of experiments on the deterrent effects of mandatory arrests on misdemeanor domestic violence, which were spearheaded in Minneapolis by Sherman and Berk (1984). In the original study the authors found that arresting people involved in a domestic violence incident, regardless of the situational factors, had a greater deterrent effect on future domestic violence compared to mediation by a police officer and separating the parties involved for an eight hour period. Since this study, however, there have

been multiple replication studies in various cities. The results of these follow-up studies show that mandatory arrest policies have equivocal results. In some cases the policy had a deterrent effect, in some cases it had no effect, and in some cases it had an escalation effect (Sherman, 1992). These follow-up studies suggest that deterrence strategies may not substantially deter future domestic violence. Even in light of the recent findings, mandatory arrest policies are ubiquitous throughout police agencies in the United States.

More relevant to this thesis, the Sherman and Berk (1984) study did not record the procedures involved during the interaction between police and domestic violence suspects. It could have been the manner in which suspects were dealt with that explained the findings. Specifically, Paternoster et. al. (1997) examined the relationship between procedural justice and spousal assault. This study found that those parties who had been arrested and perceived low levels of procedural justice were the most likely to commit future acts of domestic violence. Those parties who were arrested but perceived high levels of procedural justice and parties who were not arrested were predicted to have similar outcomes. Being detained in jail for long periods of time had an adverse effect on perceptions of procedural justice. In such cases, people tended to feel as if their due process rights had been violated and/or the sanction was excessive. Perceptions of procedural justice were found to have an inhibiting effect on spousal assault reoffending. This study suggests that procedural justice can offset the criminogenic effect of mandatory arrest policies.

The police are the primary and most visible force of formal social control in America. Policing is the institution with the responsibility of controlling public disorder and maintaining public safety. In a study of New York City residents, Sunshine and Tyler (2003) found that police legitimacy was predominantly based on procedural justice. Performance evaluations and distributive justice also contributed to legitimacy, although to a much lesser extent. This finding indicates that it is not so much how well the public perceives the job performance of the police that matters, but rather how the public perceives they are being treated by the police. Normative values and instrumental values are important, distinct constructs. The social values contributing to legitimacy are distinct from performance evaluations. The study found that legitimacy was the most substantial predictor contributing to cooperation and compliance with the law. The effect of deterrence based variables, such as the risk of getting caught or certainty of punishment, had little to do with compliance and cooperation with the law.

The police, however, are not immune to problematic behavior themselves. Bad things can happen when the police conduct themselves inappropriately. Such misconduct has a damning effect on police legitimacy. Research suggests that the majority of police misconduct occurs in disadvantaged areas where the police presence is high (Kubrin and Weitzer, 2003b). Research has shown that residents living in areas with structural disadvantage have less confidence in the police. Vigilante justice occurs more often in these areas because citizens there feel that the police would be less attentive or unresponsive to calls for police service

(Kubrin and Weitzer, 2003b). With the police being perceived as ineffective, residents in these communities may feel under protected by law enforcement.

In a longitudinal study of New York City residents, Kane (2005) found that, consistent with the ecology of crime expectations, increases in disadvantage in a community predicted increases in violence. Areas with lower levels of concentrated disadvantage had lower levels of violent crime. Findings from this study suggest that overly aggressive enforcement practices and police misconduct, both a form of procedural injustice, shaped the communities' perceptions of legitimacy. These factors influenced police precincts differentially based on the degree of structural disadvantage. In short, higher levels of disadvantage were found to be associated with lower levels of police legitimacy, and an increase in violent crime was the result. Thus, legitimacy mediated the effects of structural disadvantage on violence.

Where someone lives matters in the context of experiencing violence and crime. Areas of concentrated disadvantage have a higher incidence of violence and crime compared to the more affluent suburbs. Such contextual factors contribute to lower levels of perceived legitimacy and lower levels of police satisfaction (Kane, 2005; Murphy 2009). A disturbing reality about disadvantaged areas in inner-cities is that minority residents are concentrated there, and they are the likely subjects of the overtly aggressive or invasive police practices and police misconduct.

As a consequence of these contextual processes, the feeling of being racially profiled has undesired consequences. Obviously, a police officer will not

acknowledge that he/she stopped a citizen because the person belongs to a minority group. Police may sometimes use the ambiguous rationale that the person fits the description of a suspect, or some other pretext like failure to use a blinker in order to search someone. Minority groups do have higher levels of perceived mistreatment by the police, and as a result they tend to hold more critical views of legitimacy and support the police less (Weitzer, 2002).

A study of California residents found that those who felt that they were profiled due to their race were less likely to obey the edicts of authorities and that if individuals believed the police to be fair, neutral, respectful, trustworthy and polite they were less likely to feel that they had been profiled (Kane, 2005). A similar study of New York City respondents by Kane (2005) found that profiling undermines police performance evaluations and the police-community relationship, especially for minorities. If people believe that racial profiling is rampant, they are less inclined to support the police and the justice system in general. The study found that procedural justice mediates judgments about racial profiling. Those individuals who experienced a procedurally fair encounter with the police were less likely to believe that profiling is prevalent in their area. A third study by the researchers, also of New York City respondents, found that views of profiling were directly linked to legitimacy and police performance among non-whites, but not for whites. It follows that racial profiling is not a major concern for citizens who are not routinely subjected to it. Racial profiling has a damaging effect on legitimacy and public support for the police. Thus, agencies can minimize negative judgments by using authority equitably and in a

reasonable manner for all racial and ethnic groups. Authorities being fair entails quality decision making (neutrality), quality treatment (respect), and trustworthiness (desire to be fair) when interacting with the public, even if the law was broken (Tyler and Wakslak, 2004).

Dynamics of procedural justice and legitimacy are not limited to citizens' encounters with police and courts. The same concept is at work within prisons as well. Prison officials who do not operate in a fair and respectful way toward inmates may contribute to prisoner misconduct (Tyler, 2003). The prison environment is inhospitable. Politically popular "get tough" policies have made the prison environment worse by overcrowding and restricting rewards for good behavior. It is perhaps not surprising that inmates do not always comply with prison authorities' directives. Research indicates that such punitive policies have not had the desired effect (Tyler, 2003; Reisig and Mesko, 2009).

Reisig and Mesko (2009) used a sample of prison inmates in Slovenia to test a procedural justice model within an inmate population. They found that reported prisoner misconduct and procedural justice judgments are negatively correlated. The more an inmate is treated fairly and respectfully, the less the likelihood of misconduct. This relationship remains statistically significant even when controlling for other factors such as unconventional attitudes and criminal history. Those inmates with a lengthy criminal history and those who condone violence do have a higher rate of misconduct than other inmates, but fair and respectful treatment can reduce the amount of rule-breaking by prisoners generally. Deterrence-based correctional policy that assumes that self-interest,

rewards and punishments are the way to garner prisoner compliance suffers an empirical deficiency. These policies are intuitively appealing, easy to understand, and politically popular. However, procedural justice based strategies offer more promising results.

The desire to be treated fairly extends to various aspects of human interactions, not just correctional interactions. The line of inquiry noted previously is extended by Kristina Murphy's (2009) work in Australia. Previous research has followed suit supporting the need for procedurally just interactions with police and authority figures in Australia. Australians are more likely to view the police as legitimate and are more satisfied with police when they experience procedurally just interactions with criminal justice officials (Hinds and Murphy, 2007). Her 2009 study is insightful because it examines the differences between involuntary police-initiated contacts (where the police initiate contact with a suspect) and voluntary citizen-initiated contacts (where citizens request police service). Prior research generally shows that voluntary contacts with the police tend to lead to feelings of higher police satisfaction while involuntary contacts with police tend to lead to less satisfaction (Skogan, 2005). All things considered, procedural justice works differently for the two groups. For voluntary citizen-initiated contacts, outcomes were more important than procedurally just interactions. The opposite is true for involuntary police-initiated contacts. In the case where the police approach a person, procedural justice is the main factor contributing to assessments of police performance. This is because people who request police services are looking for and expecting certain outcomes, so

achieving those outcomes become the primary measure of satisfaction in citizen-initiated cases, while individuals contacted by the police did not ask for the contact and their primary concern is the expectation of fair treatment by the police (Murphy, 2009).

International studies may be used to compare the American legal system with that of other countries' legal systems with regard to legitimacy. It has been noted in the research that Nordic countries have an unusually high level of support for and trust in law enforcement compared to the United States. In a democracy like that of the United States and in the countries of Scandinavia, the police are heavily scrutinized by the public. Police actions and the laws they enforce need to be deemed as just and reasonable; when they are not, support and trust in agents of the system decreases. Democratic societies have the right and responsibility to monitor police activities and to take part in the public discourse of what police practices and laws are appropriate. When people have a voice, the authorities are generally more legitimate in exercising their authority.

Again, legitimacy, procedural justice, support and trust in police are all related, regardless of where in the world police-citizen interactions take place. Several factors contribute to support and trust in the police. For example, living in high crime areas tends to be associated with lower levels of police support (Reisig and Parks, 2000). People who experience more crime tend to have less faith in the ability of police to protect them. Those recently victimized also tend to have less support for police for the same reasons (Kaarianen, 2008; Carter, 1985). Kaarianen (2008) demonstrated in a study of Finnish citizens that

procedural justice can mitigate the ill effects of being victimized. Victims and witnesses of crimes in Finland did not lose trust in the police. Finland has one of the lowest crime rates in the industrialized world. It also has a comparatively low number of police officers per capita. Surely, there are a number of contributing factors to this outside of policing policies. Kaarianen argues that the relationship between the police and Finnish people is a healthy one. The Finnish people trust their police force more so than many other countries because of how well they are treated by the police, even after being victimized. This may be because the role of the police in Finland is different from that of the United States where crime control is a priority.

When measuring compliance to the law, demographic variables account for very little when procedural justice and legitimacy variables are introduced. The race effect with satisfaction of police becomes much less pronounced when contextual factors are accounted for (Tyler, 1990; Murphy, 2009; Reisig and Parks, 2000). This suggests that it is not just because someone is from a minority group that they will automatically have critical feelings about the police and that they will not comply with the law. Minorities have more contact with the legal system in part because a large proportion of policing resources are dedicated to the inner-city where racial and ethnic minorities are more highly concentrated. Likewise, the amount of wealth someone has does not influence their perceptions of authority figures and their operating procedures. The fairness of the interaction is what is really important.

It has been established that procedural justice leads to legitimacy which in turn leads to voluntary compliance to the law. Procedural injustice leads to lower views of legitimacy and, consequently, noncompliance to the law.

Noncompliance does not necessarily mean future law breaking. That is not made explicit by the procedural justice literature. However, there is an alternative theoretical framework similar to the concepts of procedural justice that predicts negative or unpleasant experiences with authorities can cause crime rates to climb: Sherman's (1993) defiance theory. A growing body of evidence suggests that criminal sanctions can backfire. Research on sanctions and the deterrent effects of sanctions is mixed. Some studies suggest they prevent future crime, some suggest they are irrelevant to future crime, and some suggest sanctions actually incite future crime. In the end, sanctions affect people differently based on a variety of social factors (Sherman, 1993).

Two common themes have been developed in the review of sanction effects. First, violations of expected fair treatment when sanctions are delivered have an increasing effect on crime, and second, sanctions will increase crime or fail to deter crime among social out-groups even while they deter social in-groups (Sherman, 1993). Social out-groups are those individuals who are not part of the dominant normative social culture. They are considered by the dominant social group as being anti-social or marginal to mainstream society. The in-group has pro-social attitudes and behaviors that are considered normal and are adopted by most members of society.

Sherman defines defiance as “the net increase in the prevalence, incidence, or seriousness of future offending against a sanctioning community caused by proud, shameless reaction to the administration of a criminal sanction.” It is a reaction to formal and informal punishment. Defiance occurs when the offender views the criminal sanction as unfair, the offender is poorly bonded to or alienated from the sanctioning body, the offender views the sanction as stigmatizing, and the offender refuses to acknowledge the shame the sanction has caused (Sherman, 1993). When a sanction is viewed as fair, a well-bonded offender who accepts the shame of the sanction will likely be deterred from future offending. When a sanction is viewed as unfair, defiance theory predicts three possible reactions. First, when a poorly bonded offender accepts the shame an unfair, stigmatizing sanction induces, the sanction will be irrelevant to future offending. Second, when a poorly bonded offender denies the shame they feel and respond to it with anger, the stigmatizing sanction will tend to increase future offending through defiant attitudes. Third, when an offender is well-bonded, the social bonds will mitigate a defiant response. Social bonds are critical to behavioral studies because social bonding variables are some of the best predictors of anti-social and pro-social behaviors (Sherman, 1993).

Belvedere, Worrall, and Tibbetts suggest in their 2005 study that the increased levels of resistance to the police within minority communities is explained by defiance theory. They argue that minorities often feel unfairly treated by white officers thus enhancing defiant attitudes toward the police. Piquero and Bouffard (2003) found that confrontational and physically aggressive

actions by the police generate defiant behaviors like refusing to cooperate, cursing at the officer, and becoming physical with the officer. Bouffard and Piquero (2010) found that defining the sanction as unfair and being poorly bonded to the community are the most important factors contributing to defiance.

Chapter 4

METHODOLOGY

This study is important and contributes to the literature because it furthers the extant knowledge on procedural justice. A review of the literature shows that studies of procedural justice almost always use samples drawn from the general population. Arrestee populations are underrepresented in procedural justice research. Certainly, there is valuable information to be learned from studying arrestee populations. It is likely that arrestees have more contact with criminal justice system agents, which may potentially lead to greater defiance and lower levels of perceived legitimacy. There may be processes at work that affect arrestees differently than individuals in the general population. Frequent offenders are in contact with the police more often than the general population, and less than 10% of criminals commit the vast majority of crimes (DeLisi, 2005). There may be differences in how these offenders perceive procedural justice and legitimacy. The sample for this study is drawn from the arrestee population in Maricopa County, Arizona. Which factors contribute to perceptions of procedural justice and legitimacy, and compliance and cooperation with the law within the arrestee population? Are the contributing factors similar for both arrestee and general populations? This thesis will address these questions.

The data used in this study were collected by the Arizona Arrestee Reporting Information Network, or AARIN project based at The Center for Violence Prevention and Community Safety at Arizona State University (ASU) in downtown Phoenix, Arizona. The AARIN project is funded in part by the

Maricopa County, Arizona Manager's Office and any opinion contained within this thesis does not reflect the opinions of Maricopa County. The research was approved by ASU's Human Subject Review Board (#0610001246). Survey workers interviewed a random sample of arrestees who have been recently arrested in Maricopa County. The random sampling procedure provides generalizability to the greater arrestee population within Maricopa County. Respondents in the sample are interviewed sometime between being booked into jail and release from jail after their initial appearance in court. There is a 48 hour "cap" for interview availability. If the arrestee had been in custody for more than 48 hours, they were not interviewed. This is because urine analyses were collected to validate the surveys, and some chemicals in the urine metabolize during the 48 hour window. Interviews typically lasted between 20 and 45 minutes, and were voluntary and confidential. The sample size included 337 arrestees, which is large enough for descriptive and inferential analysis. In total there were .03% of cases with missing data for key variables. The missing data were imputed using a linear imputation function in the SPSS statistical software package. Linear imputation replaces missing data with the most likely imputed value. This process is an acceptable way to deal with missing data.

The dependent variables used in this analysis are procedural justice, legitimacy, compliance, and cooperation. The variables are measured as additive scales and the questions and statements used to compile these outcome measures are consistent with the established research (Tyler, 1990; Reisig, Bratton, and Gertz, 2007). Procedural justice is measured by responses of strongly disagree,

disagree, agree, or strongly agree to the following statements: Police treat people with respect; police take time to listen to people; police treat people fairly; police respect people's rights; police generally act professionally; and police usually explain their actions and decisions. The procedural justice scaled dependent variable is reliable with a Cronbach's Alpha of .892. Legitimacy is measured by the same response options to the following statements: You should do what police tell you to do even if you disagree; you should accept police decisions, even if you think they are wrong; the police can be trusted to make decisions that are right for your community; most police officers in your community do their job well; and most police are honest and trustworthy. The scaled legitimacy dependent variable is also reliable with a Cronbach's Alpha of .802. These measures have been used in prior research to operationalize legitimacy; however, a couple of the items may be argued to be more related to procedural justice or distributive justice (Reisig and Mesko, 2009). Police being honest and trustworthy could measure legitimacy or procedural justice. Police doing their job well is also related to police performance or distributive justice. These items were included in the scales because they have been validated as measures of legitimacy in the literature, and including them increases the magnitude and variability in the scale. Cooperation with the law is measured by Likert responses of very unlikely, unlikely, likely, or very likely to questions of how likely a respondent would: Call the police to report a theft/burglary where they were the victim; call the police to report a minor (misdemeanor) crime; call the police to report a serious (felony) crime; call the police to report a violent crime when they were the victim;

report suspicious activity near their residence; report suspicious activity in their neighborhood; provide information to police to help find a suspected criminal; and provide information to police anonymously to help find a suspected criminal. Cronbach's Alpha for cooperation is .924 which indicates internal consistency and reliability. Compliance is measured by recording how often respondents bought something they thought might be stolen, drank alcohol somewhere they were not supposed to, illegally disposed of trash or littered, and violated traffic laws. Respondents could answer never, not often, often, or very often to these questions. Compliance is internally consistent with a Cronbach's Alpha of .990 which is conducive to being reliable.

Three independent variables are of particular interest as guided by prior research. Ethnicity has shown to be an important variable in the academic literature. In this analysis, ethnicity is defined as African-American or Hispanic which are coded nominally. The reference ethnic group in the regression analyses include: Caucasians, Asians, Native Americans, and others not identified as Hispanic or African-American. Police use of force or threatened use of force is a dichotomous variable and included in the analysis. Previous findings suggest that police use of force is negatively related to perceptions of procedural justice. Contact initiation is also a dichotomous variable. Police-initiated contact includes if the police contacted the respondent either because the respondent was pulled over for a traffic violation, had an outstanding warrant, or was crime suspect. Other variables included are frequency of drug use, recent victimization, mental health, gender, number of arrests during the past year, gang involvement,

education, legitimate employment (illegitimate employment is not included in the analysis), age, and income.

Table 1 below shows descriptive statistics for the variables in the analysis. Procedural justice scores range from a minimum of 0 to a maximum of 18. The mean is 8.922 with a standard deviation of 3.686. This variable is normally distributed with a slight positive skew. Legitimacy scores range from a minimum of 0 to a maximum of 15. The mean is 7.812 with a standard deviation of 2.683. This variable is normally distributed as well.

Table 1
Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
Procedural Justice	337	0	18	8.922	3.686
Legitimacy	337	0	15	7.812	2.683
Cooperation	337	0	24	13.679	6.028
Compliance	337	0	12	2.337	2.339
Victimization	337	0	279	3.774	21.328
Drug Use	337	0	95	11.789	16.635
Gender	337	0	1	0.751	0.433
Income	337	0	25000	1239.089	1872.065
Employment	337	0	1	0.507	0.501
Education	337	0	4	1.122	1.072
Mental Health	337	0	1	0.246	0.431
Gang Membership	337	0	1	0.1306	0.337
Age	337	17	65	31.515	10.855
Hispanic	337	0	1	0.303	0.460
African-American	337	0	1	0.145	0.353
Number of Arrests	337	0	20	0.763	1.809
Police Initiated Contact	337	0	1	0.823	0.380
Use of Force	337	0	1	0.206	0.404
Valid N	337				

Cooperation scores range from a minimum of 0 to a maximum of 24. The mean is 13.679 and the standard deviation is 6.028. The distribution for cooperation is censored by the scope of the scale. For the analysis, this variable has been transformed into a binary variable. Scores ranging from 0 to 8 are labeled as the uncooperative category and are coded as 1. Almost 20% of the respondents fall in this uncooperative category. Scores ranging from 9 to 24 are labeled as the cooperative category and are coded as 0. About 80% of respondents fall in the cooperative category. The bottom third of scores are uncooperative with police, while the top two-thirds are cooperative. Compliance is a combined scale variable with scores ranging from 0 to 12. Zero scores represent the most compliant respondents and scores around 12 represent the least voluntary compliant respondents. The mean for this variable is 2.34 and the standard deviation is also 2.34. Much of the distribution in compliance is clustered around lower limit of the scale. For analysis, compliance is transformed into a binary variable predicting noncompliance with the law. Scores from 7 to 12 are coded as 1 and are considered noncompliant. Individuals in this cluster say they often break the laws listed above. Scores from 0 to 6 are coded as 0 and represent compliant respondents. About 90% percent of the respondents are compliant while about 10% are noncompliant.

Ethnicity is captured using two dummy variables: African-American (yes/no) and Hispanic (yes/no). Almost 50 of the respondents were African-American, and 102 of them were Hispanic. The mean for African-American is

.15 with a standard deviation of .35. Hispanic has a mean of .30 with a standard deviation of .46. Use of force is also measured as a dummy variable. The mean is .21 and the standard deviation is .40. About 70 of the 337 participants had force used or threatened against them by the police. Police-initiated contact is a binary variable. A total of 275 of the 337 contacts were initiated by the police, the rest were citizen-initiated contacts. The mean for this variable is .82 and the standard deviation is .38. Drug use is a count variable and measures how many days in the past thirty days a respondent used drugs for each category of drug. For example, if the respondent used only marijuana one day out of the last thirty, that would count as one, but if they used cocaine during the same day as the marijuana, then it would be coded as two. An exhaustive list of illicit drugs is accounted for including using prescription drugs illegitimately. The range of drug use is 0 to 95. The mean score is 11.79 with a standard deviation of 16.64. Victimization measures how many times a respondent had been a victim of violence within the past year. The range for victimization is 0 to 279. There are a few outliers in this distribution. The mean is 3.77 with a standard deviation of 21.33. Mental illness is a binary variable and records whether or not the respondent had ever been diagnosed with a mental illness or an emotional problem. The mean for this variable is .25 and the standard deviation is .43. Eighty-three of the 337 respondents had been diagnosed with a mental illness or an emotional problem by a doctor, counselor, or social worker. Number of arrests is a continuous variable and measures how many times the respondent has been arrested in the last year, not including the current arrest. Arrests range from 0 to

20. The mean is .76 and the standard deviation is 1.81. Gender is dichotomous, male being coded as 1 and female coded as 0. The mean is .75 and the standard deviation is .43. A total of 253 of the 337 respondents were male. Gang involvement measures whether or not the participant has ever been in gang, currently or in the past. Forty-four of the participants reported some level of gang involvement either currently or in the past. The mean is .13 and the standard deviation is .34. Education measures the level of formal education successfully completed. The categories for this variable are specified as: did not graduate high school (coded as 0), graduated high school or got a GED (coded as 1), attended some college (coded as 2), graduated with a trade, vocational, or associates degree (coded as 3), or graduated with a 4 year degree (coded as 4). The mean value is 1.12 and the standard deviation is 1.07. Employment is a dichotomous variable measuring legitimate employment that is at least part-time. The mean is .51 with a standard deviation of .50. Altogether, 171 of the 337 participants reported having legitimate employment that was at least part time. Age is counted in years. Age ranges from 17 years old to 65 year old. The mean is 31.51 and the standard deviation is 10.86. Income is a continuous variable and measures how much legal income the respondent earned in the past month. Income ranges from 0 to 25,000. The mean score is 1,239.10 with a standard deviation of 1872.07.

Bivariate correlation analysis shows that multicollinearity between variables in the data used in this thesis is not an issue. Procedural justice and legitimacy are the highest correlating variables with a Pearson's R of .773.

Procedural justice is moderately correlated with cooperation and weakly correlated to compliance. Legitimacy is also moderately correlated to cooperation and weakly correlated to compliance. Cooperation and compliance are weakly correlated with a Pearson's R of .044. None of the independent variables are perfectly correlated to one another and are not in violation of regression assumptions. In fact, there are no correlations within the independent variables reaching a Pearson's R of .300. The most correlated variables are education and income with a statistic of .284. The next highest correlated variable pair is gang membership and drug use with a value of .259.

Five hypotheses are explored in this analysis:

- First, drawing from our understanding that procedural justice is the basis of legitimacy, it is likely that the foundation for views of legitimacy in the arrestee population is not different from the general population.
- Second, compliance and cooperation with the law work through legitimacy. As noted earlier in the review of literature, legitimacy mitigates compliance and cooperation with the law. It is surmised that a positive relationship exists between legitimacy and compliance and cooperation to the law within the arrestee population.
- Third, it is expected that minorities will have lower levels of perceived procedural justice and legitimacy, and consequently, lower levels of compliance and cooperation as well. A common

theme in the perception literature is that race is an important variable, and that minorities tend to have more unfavorable perceptions of the criminal justice system. The same is expected in this analysis. However, it is also expected that the race effect on compliance and cooperation with the law will be diminished when procedural justice and legitimacy are included in the analytical model.

- Fourth, police-initiated contacts are expected to be associated with lower levels of procedural justice and legitimacy than citizen-initiated contacts. Past research has shown that how the police-citizen interaction was initiated matters. It is important to note that outcome favorability is not measured in the data and will not be included in this analysis.
- Fifth, police use of force or threatened use of force is expected to negatively affect views of procedural justice. Research has shown that when authorities exert their power excessively, the public is likely to view the interaction as unfair, unjust, or inequitable.

It is also expected that because attitudinal measures are temporal, that arrestees will have lower perceptions of procedural justice than the general population. Arrestees have the contact with police fresh in their mind, while respondents from the general public do not. Research has shown that the effects of contentious police contacts wane over time, thus restoring perceptions of the police to prior levels. However, this hypothesis cannot be tested directly by the

data used in this thesis. The data do not include information gathered from the general public. If the dataset contained such information, the arrestee subsample and the general population subsample could be compared to each other to determine if recent arrest diminishes perceptions of procedural justice. Future research should utilize data from both the arrestee population and general population to conduct such analysis. For purposes of this study, the results will be discussed in relation to prior research findings.

Regression analysis is used to test the hypotheses. The first model predicts procedural justice using the independent variables described above. The next limited model uses the variables to predict legitimacy. The model in a full legitimacy model includes procedural justice. This process tests the first hypothesis. In subsequent models, cooperation and compliance are predicted in limited regression models prior to full models including legitimacy and procedural justice. These models test the second hypothesis. The third, fourth, and fifth hypotheses are examined in the seven models included in this analysis.

FINDINGS

The first of several statistical models in the thesis uses ordinary least squares regression to predict the procedural justice dependent variable. Table 2 shows the results of the first model. The model as a whole is statistically significant with an F-statistic of 3.176 (df=14; $P < .001$). R-square is .121 which is fairly weak, explaining about 12% of the variance in procedural justice. Three of fourteen variables in the model are statistically significant at the .05 alpha level. Consistent with the fifth hypothesis, police use of force is statistically significant

in this model ($p < .01$) and has a slope coefficient of -1.326. Police use of force or police threatened use of force is estimated to reduce perceived procedural justice scores by 1.326. A possible explanation for this is that the threat or use of force by police during the recent arrest was viewed by the arrestee as unwarranted. Being male is also statistically significant in the model ($p < .01$). Males are more likely to hold perceptions of procedural justice than females by a difference of 1.244 on the 18 point scale. Drug use is significant as well ($p < .001$).

Table 2
OLS Regression Predicting Procedural Justice

Procedural Justice	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
1 (Constant)	8.130	0.944		8.613	0.000
Use of Force	-1.326	0.504	-0.145	-2.632	0.009
Police Initiated Contact	0.891	0.516	0.092	1.727	0.085
Number of Arrests	-0.058	0.112	-0.028	-0.516	0.606
African-American	-0.900	0.577	-0.086	-1.559	0.120
Hispanic	-0.310	0.464	-0.039	-0.669	0.504
Age	0.011	0.019	0.033	0.591	0.555
Gang Membership	-0.204	0.606	-0.019	-0.336	0.737
Mental Health	-0.276	0.488	-0.032	-0.566	0.572
Education	-0.242	0.191	-0.070	-1.267	0.206
Employment	0.389	0.422	0.053	0.922	0.357
Income	0.001	0.000	-0.012	-0.220	0.826
Gender	1.244	0.468	0.146	2.659	0.008
Drug Use	-0.044	0.012	-0.199	-3.540	0.000
Victimization	0.005	0.010	0.030	0.542	0.588

Dependent Variable: Procedural Justice

Each additional drug used in the past 30 days is associated with a .044 lower procedural justice score. This may be because recreational drug users view

drug laws and drug enforcement as unjustified, or may view their drug use as victimless, or that such laws and enforcement encroach on their personal freedoms. Ethnicity is not statistically significant in this model. Also inconsistent with the hypotheses, police-initiated contact is not statistically significant.

The next model in the analysis regresses the legitimacy scale on independent variables using ordinary least squares regression. Table 3 displays the results of the regression model. The model as a whole is statistically significant with an observed F-statistic of 2.386 (df=14; $P < .01$). The R-square value is .094, which is weak. Only about 9% of the variance in legitimacy is explained by the model, which may be expected in a model predicting legitimacy where there is no predictor measuring procedural justice. Three of fourteen variables reach statistical significance at the .05 alpha level. Police use or threatened use of force is statistically significant and has the effect of reducing legitimacy .736 points on the 15-point scale ($p < .05$). Being African-American also has a decreasing effect on perceptions of legitimacy by 1.267 points ($p < .01$). This finding is consistent with the third and fifth hypotheses, although being Hispanic was not statistically significant. Drug use is also statistically significant ($p < .01$). For each additional occurrence of drug use in the past 30 days, legitimacy scores decline by .026 points. Inconsistent with the fourth hypothesis, police-initiated contact is not statistically significant.

Table 4 shows the full model regression output of legitimacy working through procedural justice. In this model, legitimacy is the dependent variable and procedural justice is added to model as an independent variable.

Table 3
OLS Regression Predicting Legitimacy

Legitimacy	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
1 (Constant)	7.734	0.698		11.088	0.000
Use of Force	-0.736	0.372	-0.111	-1.976	0.049
Police Initiated Contact	0.350	0.381	0.050	0.918	0.359
Number of Arrests	-0.099	0.082	-0.067	-1.203	0.230
African-American	-1.267	0.426	-0.167	-2.971	0.003
Hispanic	-0.029	0.343	-0.005	-0.085	0.932
Age	0.006	0.014	0.026	0.468	0.640
Gang Membership	-0.255	0.448	-0.032	-0.569	0.570
Mental Health	-0.263	0.360	-0.042	-0.731	0.466
Education	0.002	0.141	0.001	0.014	0.989
Employment	-0.101	0.312	-0.019	-0.324	0.746
Income	0.001	0.000	-0.005	-0.083	0.934
Gender	0.618	0.346	0.100	1.789	0.075
Drug Use	-0.026	0.009	-0.158	-2.782	0.006
Victimization	-0.001	0.007	-0.011	-0.202	0.840

Dependent Variable: Legitimacy

This model tests if legitimacy is produced by procedural justice. The model as a whole is a good fit and is statistically significant with an F-statistic of 34.674 (df=15; P<.001). Adding the procedural justice scale variable to the model significantly increases the explained variance in legitimacy. The model performs well with an R-square value of .618. Almost 62% of the variance in legitimacy is explained in this model. The previous model excluding procedural

justice only explained about 9% of the variance in legitimacy. This model including procedural justice supports the hypothesis that legitimacy works through procedural justice. The procedural justice variable is statistically significant in this model ($p < .001$). More specifically, an increase of 1 point on the procedural justice scale is associated with a .562 point positive change on the legitimacy scale. The two scales do not use the same metric.

Table 4
OLS Regression Predicting Legitimacy through Procedural Justice

Legitimacy through Procedural Justice	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
1 (Constant)	3.163	0.503		6.289	0.000
Use of Force	0.010	0.245	0.001	0.040	0.968
Police Initiated Contact	-0.151	0.249	-0.021	-0.606	0.545
Number of Arrests	-0.067	0.054	-0.045	-1.247	0.213
African-American	-0.761	0.278	-0.100	-2.736	0.007
Hispanic	0.145	0.223	0.025	0.652	0.515
Age	0.000	0.009	0.001	0.029	0.977
Gang Membership	-0.140	0.291	-0.018	-0.482	0.630
Mental Health	-0.108	0.234	-0.017	-0.461	0.645
Education	0.138	0.092	0.055	1.500	0.135
Employment	-0.320	0.203	-0.060	-1.575	0.116
Income	0.001	0.000	0.005	0.129	0.898
Gender	-0.081	0.227	-0.013	-0.355	0.722
Drug Use	-0.001	0.006	-0.005	-0.134	0.893
Victimization	-0.004	0.005	-0.035	-0.945	0.345
Procedural Justice	0.562	0.027	0.773	21.001	0.000

Dependent Variable: Legitimacy

The legitimacy scale ranges from 0 to 15 while the procedural justice scale ranges from 0 to 18, so the standardized coefficient better captures the relationship. One standard deviation increase in procedural justice predicts a standard deviation increase of .773 in legitimacy. The only other predictor that is statistically significant in this model is the being African-American ($p < .01$.) The coefficient for the variable is -.761 which is a smaller effect than was found in the previous legitimacy model that does not include procedural justice. This suggests that procedural justice mediates the effect of ethnicity on legitimacy, supporting the third hypothesis. Police use of force and drug use are not significant in the full model and when controlling for procedural justice, use of force does not predict legitimacy. Procedural justice accounts for the variance explained in legitimacy that was previously explained by police use of force and drug use.

Next, a logistic regression model was employed to predict the cooperation with police dependent variable. This alternative analytic approach was used because there is a slight abnormality in the distribution of the dependent variable, where the data points are censored by the scale. The binary analysis predicts the lack of cooperation. The uncooperative category is coded as 1 and the cooperative category is coded as 0. Table 5 shows the output of the regression analysis. The model is statistically significant and has a Nagelkerke R-square of .222 ($p < .001$). A total of 22.2% of the variance in cooperation is explained by the model. Drug use is statistically significant in this model ($p < .05$). Each additional drug used per day in the past month increases the odds of being uncooperative by 2%. The inhibiting effects of using mind altering substances may contribute to

this finding, as well as the users' beliefs concerning the unfairness or moral validity of drug laws. Gender (male) is also statistically significant where males are more than twice as likely to be uncooperative than females ($p < .05$). This may be expected considering that males are more likely to be combative.

Table 5
Logistic Regression Predicting Noncooperation

	B	S.E.	Wald	df	Sig.	Exp(B)
Step 1 ^a Victimization	0.009	0.007	1.806	1	0.179	1.010
Drug Use	0.019	0.009	4.646	1	0.031	1.019
Gender	0.849	0.409	4.315	1	0.038	2.336
Income	0.000	0.000	4.015	1	0.045	1.000
Employment	-0.960	0.336	8.169	1	0.004	0.383
Education	-0.140	0.161	0.759	1	0.384	0.869
Mental Health	-0.130	0.370	0.123	1	0.726	0.878
Gang Membership	0.079	0.420	0.036	1	0.850	1.083
Age	-0.009	0.015	0.385	1	0.535	0.991
Hispanic	0.503	0.351	2.056	1	0.152	1.653
African-American	-0.049	0.477	0.011	1	0.918	0.952
Number of Arrests	0.175	0.084	4.393	1	0.036	1.192
Police Initiated Contact	0.738	0.461	2.562	1	0.109	2.091
Use of Force	0.974	0.345	7.982	1	0.005	2.648
Constant	-2.749	0.811	11.48	1	0.001	0.064

Dependent Variable: Noncooperation

Having legitimate employment, at least part-time, is also statistically significant and reduces the likelihood of being uncooperative by a factor of two ($1.0/.383=2.61; p < .01$). The number of arrests during the last year is also statistically significant ($p < .05$). Each additional arrest is associated with a 20% increase in the likelihood of being uncooperative with the police. Police use of force or threatened use of force is significant and increases the likelihood of being uncooperative by about 160% ($p < .01$). This may be because some arrestees feel

that force was unwarranted, and as noted in the review, when police introduce competitive or confrontational attitudes into the interaction the arrestee may respond with a competitive gesture.

Table 6 shows the results of a binary logistic regression where procedural justice and legitimacy are added to the earlier model. The model is statistically significant ($p < .001$) and the Nagelkerke R-square is increased to .364. Thus, the model explains 36.4% of the variance in cooperation with police. Adding the procedural justice and legitimacy variables increased the predictive power of the model by about 14%.

Table 6
Logistic Regression Predicting Noncooperation through Procedural Justice and Legitimacy

		B	S.E.	Wald	Df	Sig.	Exp(B)
Step 1 ^a	Victimization	0.011	0.007	2.460	1	0.117	1.011
	Drug Use	0.009	0.010	0.824	1	0.364	1.009
	Gender	1.228	0.456	7.260	1	0.007	3.414
	Income	0.000	0.000	2.851	1	0.091	1.000
	Employment	-0.926	0.358	6.691	1	0.010	0.396
	Education	-0.191	0.173	1.219	1	0.270	0.826
	Mental Health	-0.267	0.405	0.435	1	0.510	0.766
	Gang Membership	0.054	0.454	0.014	1	0.906	1.055
	Age	-0.009	0.016	0.326	1	0.568	0.991
	Hispanic	0.481	0.380	1.599	1	0.206	1.618
	African-American	-0.492	0.525	0.876	1	0.349	0.612
	Number of Arrests	0.195	0.102	3.671	1	0.055	1.215
	Police Initiated Contact	0.849	0.472	3.234	1	0.072	2.338
	Use of Force	0.675	0.378	3.197	1	0.074	1.965
	Legitimacy Scale	-0.198	0.093	4.589	1	0.032	0.820
	Procedural Justice	-0.149	0.072	4.259	1	0.039	0.862
	Constant	-0.194	0.954	0.041	1	0.839	0.824

Dependent Variable: Noncooperation

Interestingly, drug use, income, arrests, and use of force are no longer significant in this full model. Procedural justice and legitimacy have a mediating effect on cooperation with the police. Gender remains statistically significant ($p < .01$). In this model, males are over three times more likely to be uncooperative than females. Again, males are more likely to be combative. Employment is also statistically significant ($p < .05$). Being employed reduces the odds of being uncooperative by over two times. Procedural justice and legitimacy are both statistically significant ($p < .05$) and account for the variance previously explained by non-significant predictors. An additional one point increase in the scale of perceived procedural justice reduces the likelihood of being uncooperative by 16% ($1.0/.862=1.160$). An additional point increase in the legitimacy scale decreases the odds of being uncooperative by 22% ($1.0/.820=1.219$). This suggests that an arrestee will be more inclined to cooperate with the police if they view the police as legitimate, and have procedurally just interactions with police officers.

Binary logistic regression was used to predict noncompliance with the law. Like the models above, a limited model predicted the dependent variable without procedural justice and legitimacy, then a full model predicting noncompliance to the law that included those variables concludes the analysis in this thesis. Table 7 shows the output for the limited model and table 8 shows the output for the full model. Neither of the models are significant nor do they have any statistically significant predictors, which is contrary to the second hypothesis.

Table 7
Logistic Regression Predicting Noncompliance

	B	S.E.	Wald	df	Sig.	Exp(B)
Step 1 ^a Victimization	0.007	0.006	1.281	1	0.258	1.007
Drug Use	-0.009	0.012	0.594	1	0.441	0.991
Gender	0.046	0.452	0.010	1	0.920	1.047
Income	0.000	0.000	0.183	1	0.669	1.000
Employment	-0.436	0.416	1.095	1	0.295	0.647
Education	-0.208	0.200	1.073	1	0.300	0.812
Mental Health	-0.174	0.468	0.137	1	0.711	0.841
Gang Membership	0.438	0.507	0.746	1	0.388	1.550
Age	-0.009	0.018	0.256	1	0.613	0.991
Hispanic	0.115	0.443	0.068	1	0.795	1.122
African-American	0.361	0.525	0.474	1	0.491	1.435
Number of Arrests	0.115	0.075	2.356	1	0.125	1.122
Police Initiated Contact	-0.146	0.475	0.094	1	0.759	0.864
Use of Force	0.558	0.429	1.693	1	0.193	1.746
Constant	-1.716	0.880	3.799	1	0.051	0.180

Dependent Variable: Noncompliance

The first model has a Nagelkerke R-square of .067 meaning that only 6.7% of the variance in noncompliance is explained by the limited model. Such is a poor performance. The full model that includes procedural justice and legitimacy has a Nagelkerke R-square of .093 which means that adding procedural justice and legitimacy to the model only increased the variance explained in noncompliance by 2.6%. The model does not predict noncompliance well. This result may be because voluntary compliance to the law is more related to variables not included in the data used in this study.

Table 8
 Logistic Regression Predicting Noncompliance through Procedural Justice and
 Legitimacy

	B	S.E.	Wald	df	Sig.	Exp(B)
Step 1 ^a Victimization	0.008	0.007	1.389	1	0.239	1.008
Drug Use	-0.005	0.012	0.168	1	0.682	0.995
Gender	-0.064	0.46	0.019	1	0.890	0.938
Income	0.000	0.000	0.104	1	0.748	1.000
Employment	-0.435	0.422	1.062	1	0.303	0.647
Education	-0.212	0.205	1.065	1	0.302	0.809
Mental Health	-0.159	0.474	0.112	1	0.738	0.853
Gang Membership	0.448	0.513	0.762	1	0.383	1.565
Age	-0.012	0.019	0.409	1	0.523	0.988
Hispanic	0.174	0.448	0.150	1	0.698	1.189
African-American	0.611	0.543	1.265	1	0.261	1.841
Number of Arrests	0.135	0.078	3.028	1	0.082	1.145
Police Initiated Contact	-0.183	0.482	0.144	1	0.705	0.833
Use of Force	0.660	0.439	2.255	1	0.133	1.934
Procedural Justice	0.019	0.080	0.056	1	0.814	1.019
Legitimacy	0.140	0.111	1.578	1	0.209	1.150
Constant	-2.976	1.087	7.492	1	0.006	0.051

Dependent Variable: Noncompliance

Chapter 5

DISCUSSION AND CONCLUSION

Research on procedural justice shows clearly that the interpersonal processes and dynamics involved in an interaction between citizens and agents of the criminal justice system matter and have serious consequences. The desirability of those consequences is contingent on whether the interaction is perceived as fair, sincere, and equitable or not. This study further expands our understanding of procedural justice by examining a sample of individuals from the arrestee population in Maricopa County, Arizona. Arrestee samples have not been adequately studied in the literature on procedural justice. This population is important because the role of procedural justice may differ between the individuals in the general population and individuals who have been arrested. Something may be different for people who have more frequent interactions with the police, and it is reasonable to assume that arrestees have more interactions with criminal justice system agents than the general population.

Partial support for the hypotheses is found in this study. Only partial support of the existing literature was also found in this study. Police use or threatened use of force was found to lower arrestees' perceptions of procedural justice. This may occur because some citizens involved in contacts where the police used force or threatened to use force consider the level of force as unnecessary, excessive, and unjustified. Contrary to much of the literature, ethnicity and police-initiated contacts did not reach statistical significance in the analysis where procedural justice was predicted as the dependent variable.

Consistent with prior research, this analysis found that males are more likely than females to view their interactions with the police as procedurally fair. Women appear to be more critical when making judgments about how they have been treated by authority figures.

Unexpectedly, drug use played a significant role in the models predicting procedural justice and legitimacy. Several explanations may be considered. It may be that some drug users believe drug laws and enforcement are unfair, and violate their personal liberties. It could also be that the behavior altering effects of narcotics impact the outcome variable in question. Future research may consider examining why drug use matters in forming perceptions of procedural justice.

The analysis also shows that police legitimacy works through procedural justice, which supports the first hypothesis. The model testing police legitimacy without the procedural justice included in the model performed weakly. Including the procedural justice variable increased the model's performance substantially. Procedural justice also mitigated the effect of ethnicity on views of police legitimacy. African-American arrestees tend to have less favorable views of police legitimacy than Caucasians; however, the effect is diminished when procedurally just experiences are taken into account. The first legitimacy model did not include procedural justice as part of the independent variables. In this model, police use of force and drug use reached statistical significance. When the model included procedural justice, however, use of force and drug use were no longer significant. Police use of force does not predict legitimacy within and of

itself. The effect went away when procedural justice was added to the model. It is suggested that if the offender viewed the use or threatened use of force as unwarranted then use of force is associated with lower levels of legitimacy, but if the offender behaved in a way that induced police use of force and believed he/she deserved the level of force used in the contact then the model indicates that use of force does not predict views of legitimacy. This suggests that procedural justice has a powerful effect on forming perceptions of police legitimacy even in the case of police use of force, and that the other variables that help to explain procedural justice only indirectly impact legitimacy through this procedural justice variable.

When predicting lack of cooperation, several predictors were important when procedural justice and legitimacy were excluded from the model. Drug use, use of force, gender (male), and number of arrests were all associated with being uncooperative with the police. Individuals who are legally employed are expected to be more cooperative than those who are not. More importantly, though, is procedural justice and legitimacy. Similar to the findings in the general population, the effects of procedural justice encounters and views of legitimacy are strongly associated with cooperation during police encounters within the arrestee population. The data used in this thesis shows that within the arrestee population, a five point increase on views of procedural justice or legitimacy scales, or a combination of the two, leads to an almost certain likelihood of cooperating with the police. This finding is congruent to similar findings within the general population

Contrary to the second hypothesis and the bulk of the prior research, this analysis did not find any statistically significant variables predicting noncompliance. Most of the research with samples drawn from both the general and prisoner populations has consistent findings showing that legitimacy predicts voluntary compliance with the law. This analysis did not have such results, which is problematic for this study. Several things may help explain the unexpected findings. There could be measurement error or some other deficiencies in the data concerning the compliance variable. It may be that other variables not measured in the data used here are more related to voluntary compliance to the law. Informal social controls like social bonds may be the main reason why the arrestee population abstains from drinking in public and littering, etc. Respect for the environment may be the real reason why people do not litter, and that not littering has little to do with how people are treated by justice system agents. It could also be that peoples' concern for their own well being influence their driving habits that are conducive to lawful driving and not a fear of sanctions or duty to obey traffic laws.

Surprisingly, ethnicity had little effect in this research. The ethnicity variable (Hispanic) never reached statistical significance and the effect sizes for African-Americans were lower than expected. Police-initiated contact did not reach statistical significance in this analysis, which is contrary to the fourth hypothesis and much of the research. It could be that arrestees are affected by police initiated contacts differently than other populations because they had more recent contacts with system representatives. However, it is generally recognized

that police-initiated contacts versus citizen-initiated contacts are more conducive to distributive justice research. Gang membership also had no discernable effect in this analysis. This suggests that the common stereotypes of gang members as being uncooperative, cynical law breakers may be misguided. Age also had a null effect, which sometimes had shown to be important in procedural justice research (Tyler, 1990).

In the past several decades, our justice system has experienced an increased use of deterrence-based methods and policies to “get tough” on criminals. Policies such as truth in sentencing laws and three strikes laws have gained popularity in the public and legislatures, as well as policies that harshly punish minor offenses like drug-related crimes. The guiding philosophy has been that getting tough on criminals will deter them from committing more crimes because the punishment for their indiscretions will be so great that no one will want to reoffend for fear of being caught and punished severely. Because of these stern punishment tactics, there has been an increase in the incarceration rate in the United States. Our country has more prisoners than China but only a fraction of the population and America has more prisoners per capita than any other Western industrialized country (Tonry, 2004). Many of these incarcerated individuals have been directed to the supervision of the booming private, for-profit prison industry. This strategy has cost the American tax payers a great expense while not reducing crime equivocally. Some criminologists tend to agree that such punitive sentencing strategies are both ineffective and inefficient (Tyler, 1990). Generally speaking, these policies do not work very well and cost a fortune. They

can also have unintended and dangerous effects like increasing levels of violence in communities and correctional institutions (see Pratt, 2008; *Addicted to Incarceration*).

Similar to penal efforts, policing strategies have also been poised within a “get tough” and “zero tolerance” framework over the past several decades. Municipalities all over the country have implemented policies and practices that aggressively enforce minor offenses as a way to deter or discourage people from committing more serious crimes in the future. Local cities and towns have tried to quell crime rates by flooding areas with patrol officers. The likely threat of arrest is thought to steer city dwellers clear of criminal conduct. This tactic of crime control has not fared so well and these policy approaches have been ineffectual. Realistic increases or reductions in police patrol saturation do not affect calls for police service and a rapid response to calls by police also does not affect crime (Kelling et. al., 1974; Skogan, 1990). As noted earlier, mandatory arrest policies for domestic violence have questionable results. Weisburd and Eck (2004) conclude that there is little evidence supporting the idea that the standard, deterrence-based model of policing will lead to safer communities.

It is more appropriate to think of the police as crime responders than crime preventers. Police rarely experience crimes in progress. Crime is a complex sociological problem with a litany of causal factors, most of which are structural and situational factors that formal crime control institutions have little control over, although new models of policing, such as problem-oriented policing, have shown promising results. It has also been shown that the police cannot

effectively do their job without cooperation from the public. Research on procedural justice suggests that a better way to get public cooperation with the police is to always treat citizens with fairness and concern for their well-being (Tyler, 1990).

“Get tough” policies based on the deterrence model are politically popular. The justice system in the United States is overseen by officials and policy makers who act in accordance with their constituents’ will and interests regardless whether or not those interests are validated by empirical research. As Dr. Jerry Ratcliffe has noted (ASU lecture series, 2011), “When we get the politics out of policing, we’ll get much better policing.” The same could be said about other components of the criminal justice system. Perhaps getting “smart” on crime would be better than getting “tough” on crime. Certainly, offenders need to be punished for misconduct, albeit fairly and commensurate with the seriousness of the act. It is being argued here that fear is not the best and most efficient way to coax obedience, but that the procedural justice alternative is a better model to accomplish voluntary compliance and cooperation with the law because fewer resources are required, offenders are not further marginalized, and the research suggests that it works.

There are several factors that can negatively impact perceptions of authority figures, produce less favorable views of legitimacy, and reduce voluntary compliance and cooperation with authorities’ directives. Police brutality and wrongful convictions are certainly unfair and have lingering effects, and they have undesired consequences associated with them in communities. The

public also has unrealistic expectations of the criminal justice system which also contributes to less favorable perceptions of the justice system and its representatives. As discussed earlier, disreputable events of police misconduct like the beating of Rodney King have damaging effects on perceptions and reduce support for the police, even though they are statistically rare. Technology has enabled the public to record videos with cell phones and instantaneously post those videos to the internet. As a result, the world-wide-web is littered with amateur videos of police misconduct and abuses of authority for the world to see. Police officers have been known to, albeit on rare occasion, steal from people where a person is “suspected” of dealing drugs and upon a search the police find cash (but no drugs) on the person and the cash is confiscated on the assumption that it is drug money. Police have also been known to put “suspects” in the back of squad cars and instead of taking them to the police station they take the individuals to a potentially dangerous part of the town and abandon them (Brunson, 2005.) Such behavior is not conducive to trusting attitudes.

Wrongful convictions are also a source of cynicism towards the criminal justice system. Sending the wrong person to prison means that the true offender goes free and that an innocent person has been incarcerated at the tax payers’ expense. Wrongful convictions tend to be the result of false or coerced confessions, false testimony, over-zealous prosecutors, and careless juries. Gross and associates (2004) studied exonerations in the United States between 1989 and 2003. They found 328 exonerations, some posthumously, of innocent people who had been wrongfully convicted of crimes. The sample as a whole had spent over

3400 years in prison. The study focused primarily on murder cases because of the seriousness of the crime and the fatal implications of the sentence. By their estimation, however, there could be as many as 10,000 or more people wrongfully sentenced to prison when considering the myriad crimes that carry a prison sentence. One of the most salient cases discussed in this piece concerns a mentally handicapped woman in Alabama. She had confessed to killing her baby despite the fact that she was medically incapable of having children. As a result, she was convicted and imprisoned. It is not surprising that some Americans are skeptical of the legitimacy of the American justice system.

The media has an uncanny way of changing reality. There are dozens of police dramas, forensic shows, and programs on television that depict the “realities” of the criminal justice system. These programs depict the justice system in unrealistic ways and in some cases can present the system as a source of injustice. Gaeta (2010) critiques the role of the media in relation to the criminal justice system and concludes that the popular media’s portrayal of the system is flawed and can have detrimental effects. Television programming is interested in ratings and viewership, not accuracy, the law, and justice.

Agents of the criminal justice system should take every precaution to guard against biased and inequitable actions whether they are in the domain of the police, the prosecutor’s office, the courts, or prisons because such events can degrade the public’s confidence in the fundamental institutions of justice. Police and detention officer academies should stress the importance of procedural justice to new recruits. When misconduct is discovered, agency managers should take

proactive steps to rectify the problem. The public should be able to directly communicate with justice system agents, and those agents should take the public concerns seriously. The research makes clear that procedural justice leads to legitimacy. Also, voluntary compliance and cooperation with authorities is more likely when procedural justice and legitimacy are present. Undoubtedly, voluntary compliance and cooperation with the law is the most efficient way to deal with crime problems. When criminal justice system actors collaborate in media programming, they should take steps to ensure that the mandates of the justice system supersede those of the media. When the goals of the law and the media are the same, the media can be a powerful tool in fighting crime.

This study contributes to the extant research on procedural justice. The findings tend to further substantiate previous research by examining a sample not taken from the general public. The sample used here is drawn from an arrestee population, which is understated in the current procedural justice literature. The sample was generated randomly so the findings can be extrapolated to the arrestee population within Maricopa County. The sample size is fairly large providing adequate statistical power as well. The current study used a cross-sectional design, so a causal time-ordering cannot be established. It can also be the case that voluntarily cooperating with the law leads to views of legitimacy and procedural justice, so the results should be interpreted cautiously. For example, police use of force was found to be a significant predictor in several models in this thesis, but because the data is cross-sectional and a time-order sequence has not been established it could be the case that some individuals harbor lower

perceptions of procedural justice that leads them to behave in a way that increased the likelihood of police using force against them during a contact. Longitudinal designs should be used in future research to establish proper time-order causality. Future research should also consider using samples from arrestee populations from across the United States to provide cross population generalizability. This study is only generalizable to the local arrestee population in Maricopa County. Future research should also consider gathering data from both an arrestee population and a general population with the same instruments to determine if arrestees and citizens from the general population differ on procedural justice measures.

Procedural justice is not a general theory of behavior. It is a theoretical concept. It deals specifically with one aspect of behavior, namely interactions with authorities and the consequences thereof. The current platform of criminological theory may be convoluted with several theories. It may suit the field well to consolidate specific theoretical concepts into well established general theories of crime and test those concepts in the larger framework of general theories.

Concepts within Angew's (1992) general strain theory (GST) could absorb procedural justice quite well. In short, GST states that personal strains and anger inducing events cause negative emotions, and then illegitimate processes are used to mediate that strain. GST is one of the leading theories in criminology and it owns a substantial body of empirical support (see Baron, 2004; Paternoster and Mazerolle, 1994; Moon et. al., 2009; Aseltine, Gore, and Gordon, 2000). Three

typologies of strain inducing events exist. The first is the failure to achieve positively valued stimuli. There can be a disjunction between an individual's aspirations and actual outcomes, a discrepancy between someone's expectations and actual outcomes, or a disconnect between fair outcomes and actual outcomes. The other two typologies are the removal of positively valued stimuli, and the presence of negatively valued stimuli. It is the disjunction between fair outcomes and actual outcomes in GST that can be most readily integrated with procedural justice in terms of criminological research.

CONCLUSION

In conclusion, this study reviewed literature on public perceptions, procedural justice, legitimacy, compliance, and cooperation. Common themes found in the literature are that damaging events of legal system misconduct affect public perceptions of the system; and that voluntary compliance and cooperation with the law is influenced by views of legitimacy. Procedural justice is key in developing views of legitimacy in both the general and offender populations.

Results of this analysis show that legitimacy works through procedural justice, and procedural justice mitigates the effects of ethnicity, drug use, and use of force on views of legitimacy. Cooperation with the police is enhanced when citizens hold more favorable views of procedural justice and police legitimacy. This thesis used data collected from an arrestee population which has not been

examined in the procedural justice literature. Additional studies should use samples drawn from arrestee and offender populations.

Authority figures should always be concerned about the fairness and integrity of the interactions they have with citizens and subordinates. Whether social interactions occur within the context of the law, with a manager, a teacher, or a business associate, people expect to be treated fairly and with dignity. When they are treated accordingly they are more likely to voluntarily comply and cooperate with the directives of authority figures.

REFERENCES

- Agnew, Robert. 1992. Foundation for a general strain theory of crime and delinquency. *Criminology*, 30: 1.
- Aseltine, R.H., S. Gore, and J. Gordon. 2000. Life stress, anger, and anxiety, and delinquency: An empirical test of general strain theory. *Journal of Health and Social Behavior*, 41: 3, 256-275.
- Axelrod, Robert. 1984. *The evolution of cooperation*. New York: Basic.
- Baron, Stephen. 2004. General strain, street youth and crime: A test of Agnew's revised theory. *Criminology*, 42: 2, 457-482.
- Belvedere, K., Worrall, J.L., and S.G. Tibbetts. 2005. Explaining suspect resistance in police-citizen encounters. *Criminal Justice Review*, 30: 30-44.
- Bourffard, L.A., and N.L. Piquero. 2010. Defiance theory and life course explanations of persistent offending. *Crime and Delinquency*, 56: 2, 227-252.
- Brooks, Richard. 2000. Fear and fairness in the city: Criminal enforcement and perceptions of fairness in minority communities. *Southern California Law Review*, 73: 1219-1273.
- Brooks, R.R.W., and H. Jeon-Slaughter. 2001. Race, income, and perceptions of the U.S. court system. *Behavioral Sciences and the Law*, 19: 249-264.
- Brown, R E. 1994. *The 1984-1988 national black election panel study*. Ann Arbor: University of Michigan Press.
- Brunson, Rod K. 2007. "Police don't like black people": African-American young men's accumulated police experiences. *Criminology and Public Policy*, 6:1, 71-102.
- Carter, David L. 1985. Hispanic perceptions of police performance: An empirical assessment. *Journal of Criminal Justice*, 13: 487-500.
- Chambliss, William J. 1999. *Power, politics, and crime*. Boulder, CO: Westview.
- Chiricos, Ted. 2004. The media, moral panics, and the politics of crime control. In Cole, C.F., Gertz, M.G., and Buner, A. (Eds.) *The Criminal Justice System: Politics and Policies*. 9th Edition. Belmont: CA Wadsworth

- Decker, Scott H. 1981. Citizen attitudes toward the police: A review of past findings and suggestions for future policy. *Journal of Police Science Administration*, 9: 80-87.
- DeLisi, Matt. 2005. *Career criminals in society*. Thousand Oaks, CA: Sage
- Geata, Thomas. 2010. "Catch" and release: Procedural unfairness on primetime television and the perceived legitimacy of the law. *The Journal of Criminal Law and Criminology*, 100: 2.
- Gross, S. R., Jacoby, K., Matheson, D. J., Montgomery, N., & Patil, S. (2005). "Exonerations in the United States 1989 through 2003. *Journal of Criminal Law and Criminology*, 95, 523-560.
- Hagan, J., and C. Albonetti. 1982 Race, class, and the perception of criminal injustice in America. *American Journal of Sociology*, 88: 2.
- Hagan, J., C. Shedd, and M.R. Payne. 2005. Race, ethnicity, and youth perceptions of criminal injustice. *American Sociological Review*, 70: 381-407.
- Hinds, L., and K. Murphy. 2007. Public satisfaction with the police: Using procedural justice to improve police legitimacy. *The Australian and New Zealand Journal of Criminology*, 40: 27-442.
- Hochschild, Jennifer. 1995. *Facing up to the American dream: Race, class, and the soul of the nation*. Princeton, NJ: Princeton University Press.
- Kaarianen, Juha. 2008. Why do the Finns trust the police? *Journal of Scandinavian Studies in Criminology and Criminal Justice*, 9: 141-159.
- Kane, Robert J. 2005. Compromised police legitimacy as a predictor of violent crime in structurally disadvantaged communities. *Criminology*, 43: 2.
- Kane, R.J., and M.D. White. 2009. Bad cops: A study of career-ending misconduct among New York City police officers. *Criminology and Public Policy*, 8: 4.
- Kelling, G., T. Pate, D. Dieckman, and C. Brown. 1974. *The Kansas City preventative patrol experiment: Technical report*. Washington, DC: Police Foundation.
- Kubrin, C., and R. Weitzer. 2003b. Retaliatory homicide: Concentrated disadvantage and neighborhood culture. *Social Problems*, 50: 157-180.

- Moon, B., M. Morash, C. Perez-McCluskey, and H.W. Hwang. 2009. A comprehensive test of general strain theory: Key strains, situational- and trait-based negative emotions, conditioning factors, and delinquency. *Journal of Research in Crime and Delinquency*, 46: 182-212.
- Murphy, Kristina. 2009. Public satisfaction with police: The importance of procedural justice and police performance in police-citizen encounters. *The Australian and New Zealand Journal of Criminology*, 42: 2, 159-178.
- Ogletree, Charles J. Jr. 2004. Black man's burden: Race and the death penalty in America. In Cole, C.F., Gertz, M.G., and Buner, A. (Eds.) *The Criminal Justice System: Politics and Policies*. 9th Edition. Belmont: CA Wadsworth
- Paternoster, R., and P. Mazerolle. 1994. General strain theory: A replication and extension. *Journal of Research in Crime and Delinquency*, 31: 235-263
- Paternoster, R., R. Brame, R. Bachman, and L.W. Sherman. 1997. Do fair procedures matter? The effect of procedural justice on spousal assault. *Law and Society Review*, 31: 1.
- Petersilia, Joan. 1983. *Racial disparities in the criminal justice system*. Santa Monica, CA: The Rand Corporation.
- Piquero, N.L., and L.A. Bouffard. 2003. A preliminary and partial test of specific defiance. *Journal of Crime and Justice*, 26: 1-21.
- Pratt, Travis C. 2009. *Addicted to incarceration: Corrections policy and the politics of misinformation in the United States*. Los Angeles, CA: Sage.
- Radelet, Louise A. 1980. *The police and the community*. 3d. ed. Encino, CA: Glencoe.
- Ratcliffe, Jerry. (2011, February). Intelligence-Ied lessons from the most dangerous city is America. *ASU lecture series*. Lecture conducted from Arizona State University, Phoenix, AZ.
- Reisig, M, and R. Parks. 2000. Experience, quality of life and neighborhood context: A hierarchical analysis of satisfaction with police. *Justice Quarterly*, 17: 607-630.
- Reisig, M.D., J. Bratton, and M.G. Gertz. 2007. The construct validity and refinement of process-based policing measures. *Criminal Justice and Behavior*, 34: 8, 1005-1028.

- Reisig, M.D., and G. Mesko. 2009. Procedural justice, legitimacy, and prisoner misconduct. *Psychology, Crime, and Law*, 15: 1, 41-59.
- Roberts, J.V., and L.J. Stalans. 1997. *Public opinion, crime, and criminal justice*. Boulder, CO: Westview.
- Sampson, R.J., Raudenbush, S.W., and F. Earls. 1997. Neighborhoods and violent crime. *Science*, 277: 918-924.
- Sampson, R.J., and J. Lauristen. 1997. Racial and ethnic disparities in crime and criminal justice in the United States. *Crime and Justice*, 311-374.
- Sampson, R.J., and D.J. Bartusch. 1998. Legal cynicism and (subcultural?) tolerance of deviance: The neighborhood context of racial differences. *Law and Society Review*, 32:4.
- Sherman, L.A., and R.A. Berk. 1984a. *Specific deterrent effects of arrest for domestic assault in Minneapolis*. Washington, DC: National Institute of Justice.
- Sherman, Lawrence A. 1992. *Policing domestic violence: Experience and dilemmas*. New York: Free Press.
- Sherman, Lawrence H. 1993. Defiance, deterrence, and irrelevance: A theory of the criminal sanction. *Journal of Research in Crime and Delinquency*, 30: 4, 445-473.
- Skogan, Wesley G. 1990. *Disorder and decline*. New York: Free Press.
- Skogan, Wesley G. 2005. Citizen satisfaction with police encounters. *Police Quarterly*, 8: 298-321.
- Skolnick, J.H., and J.J. Fyfe. 1993. *Above the law: Police and the excessive use of force*. New York: Free Press.
- Sunshine, J., and T.R. Tyler. 2003. The role of procedural justice and legitimacy in shaping public support for policing. *Law and Society Review*, 37: 3.
- Thibaut, J. and L. Walker. 1975. *Procedural justice: A psychological analysis*. Hillsdale, NJ: Erlbaum.
- Tonry, Michael. 2004. Racial politics, racial disparities, and the war on crime. In Cole, C.F., Gertz, M.G., and Buner, A. (Eds.) *The Criminal Justice System: Politics and Policies*. 9th Edition. Belmont: CA Wadsworth

- Tonry, Michael. 2004. Racial disproportions in U.S. prisons. In Cole, C.F., Gertz, M.G., and Buner, A. (Eds.) *The Criminal Justice System: Politics and Policies*. 9th Edition. Belmont: CA Wadsworth
- Tuch., S.A., and R. Weitzer. 1997. The polls-trends: Racial differences in attitudes toward the police. *Public Opinion Quarterly*, 61: 642-663.
- Tyler, Tom R. 1990. *Why People Obey the Law*. New Haven: Yale University Press.
- Tyler, Tom. R. 2003. Procedural justice, legitimacy, and the effective rule of law. In M. Tonry (Eds.), *Crime and Justice*. Chicago: University of Chicago Press.
- Tyler, T.R., and C.J. Wakslak. 2004. Profiling and police legitimacy: Procedural justice, attributions of motive, and acceptance of police authority. *Criminology*, 42: 2.
- Unnever, James D. 2008. Two worlds far apart: Black-white differences in beliefs about why African-American men are disproportionately imprisoned. *Criminology*, 46: 2.
- Weisburd, D., and J.E. Eck. 2004. What can police do to reduce crime, disorder, and fear? *The ANNALS of the American Academy of Political and Social Science*, 593: 42
- Weitzer, Ronald. 2002. Incidents of police misconduct and public opinion. *Journal of Criminal Justice*, 30: 397-408.
- Wright, Erik O. 1978. Race, class, and income inequality. *American Journal of Sociology*, 83: 1368-1397.

