The Effects of Police Culture and Procedural Justice on Citizens' Perceptions of Police Legitimacy and Trustworthiness

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THE EFFECTS OF POLICE CULTURE AND PROCEDURAL JUSTICE ON CITIZENS’
PERCEPTIONS OF POLICE LEGITIMACY AND TRUSTWORTHINESS

by

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Doctoral Program in Psychology

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Dedication

This is dedicated to my dissertation chair, Dr. Osvaldo Morera. Without you, I would not be here, literally. To be honest, I’m just happy to be here.

“To get something you never had, you have to do something you never did.”
THE EFFECTS OF POLICE CULTURE AND PROCEDURAL JUSTICE ON CITIZENS’ PERCEPTIONS OF POLICE LEGITIMACY AND TRUSTWORTHINESS

by

Kityara James, M.A.

DISSERTATION

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Abstract

Police departments have often cited “a few bad apples” when discussing incidents of officer misconduct or improper use of force. However, police reform organizations often posit that when the tree is bad, all fruit it bears will be rotten. Police culture serves as the root of the tree in this analogy; the basis of the characteristics and behaviors of police rely on the specifics of police culture that has been imprinted during the police academy and maintained through everyday police work. Police culture determines how police officers interact with citizens and behave on the job. Those interactions can influence how citizens perceive police officers and police institutions. How citizens perceive police officers heavily influences the relationship between police departments and the communities they police. Citizens’ perceptions of police are often determined through personal and vicarious interactions with police, media perceptions of the police, and much more. Two studies were conducted that examined the roles of police office race, procedurally just interactions with citizens, interaction outcome and an index of positive feelings about the police. Data on perceptions of the police was also collected. In Study 1, while group membership did not predict police legitimacy and police trustworthiness, positivity toward the police and enhanced personal and vicarious experiences with police officers was positively associated with police legitimacy and police trustworthiness. When perceptions of the police were added to this model, these effects disappeared. In Study 2, there were no effects of police office race, procedurally just treatment and interaction outcome on police legitimacy and police trustworthiness. When perceptions of police as added to the model, these effects emerged such that police legitimacy and police trustworthiness is enhanced when people are treated justly and when the officer is African American. Implications of using perceptions of police as a variable in future studies is discussed.
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Chapter 1: Introduction

Law enforcement agencies have been at the forefront of public scrutiny for decades. Landmark events, such as the beating of Rodney King and the deaths of George Floyd and Sandra Bland have created shifts in society that has catapulted police departments into the public eye. Due to their place in society, nearly every person residing within the continental United States has encountered law enforcement in some capacity. More than 1 in 5 people report coming in contact with police in the past 12 months (Office of Justice Programs, 2020). Though many of these interactions are positive, negative interactions may have lasting effects on the law enforcers themselves, citizens involved, and citizens in general proximity. The outcome of these interactions may be different based on citizen race or ethnicity, socioeconomic status, or gender, such that people of color, people of lower socioeconomic status, and men have more negative interactions with police (Lloyd, 2020; Williamson et al., 2023).

The relationship between law enforcement agencies and the communities they police is a topic that requires interdisciplinary empirical research. Criminologists, for example, have approached the topic through the lens of law enforcement policies and management (Greek, 2009; Mazerolle & Terrill, 2020; Paoline, 2003). Sociologists, on the other hand, adopt an interactionist approach, often highlighting the sociological circumstances surrounding the interactions between citizens and police officers, such as the race of the citizen or the presence of a complaint prior to contact (Henry, 2019; Herring, 2019). Psychologists tend to focus on use of force and psychological outcomes associated with negative interactions with police (Engel et al., 2020; Fryer, 2019; Geller et al., 2021).

Despite the wide variety of research across various disciplines, there is a gap in empirical literature that explores characteristics of police culture and how that interpretation affects
citizens’ feelings toward police overall. Studying the relationship between law enforcement and citizens is complicated. As a result, it is necessary to look at multiple influences of variables that determine outcomes of police and citizen interactions. The following studies aim to highlight characteristics of police culture and procedural justice, and how they affect perceptions of police trustworthiness and police legitimacy. Additionally, these studies will depend on common factors associated with differing opinions of police trustworthiness and police legitimacy.

**The understanding of police culture**

The understanding of police culture is imperative to police reform. Police culture is a determinant of everyday functioning for police officers. Their culture can influence how they interact with citizens, each other, and what decisions they make both on and off the job (Paoline, 2003). Traditionally, police culture is seen as monolithic, encapsulated in an “us-versus-them” mentality often characterized by hostility and hypervigilance (McLean et al., 2020; Van Maanen, 1978). Police culture, overall, has become a label for negative attitudes, values, and social norms displayed by police officers. The culture itself is a culmination of socio-political contexts and a function of the nature of the work being done by police (Chan, 1996). In reality, police culture is a complex culture, housing a variety of subcultures that may or may not overlap and are often contingent upon situational relevance (Paoline, 2003; Paoline, 2004). To help understand police culture, a brief history of policing is provided.

*History of Policing*

Police culture in the United States has gone through many transformations throughout its tenure. The police in the United States have two origins, one in the North and another in the South. Policing in the North originated during the Colonial Era as patrols, or watches, centered around protecting property and assets of wealthy businesses due to an increase in non-British or
non-Dutch immigrants (Archbold, 2012; Brown, 2020). During that same time in the South, slave patrols were forming in what is now modern-day South Carolina (Durr, 2015; Reichel, 1992). The goals of these slave patrols were to (1) apprehend escaped slaves and return them to their owners, (2) using terroristic measures to deter slaves from revolting, and (3) disciplining slaves for breaking plantation rules (Archbold, 2012; Hassett-Walker, 2021; Potter, 2013). After the Civil War ended, slave patrols subsequently disbanded, where many former members of slave patrols worked in federal and state militia while many others joined the Ku Klux Klan during the Reconstruction Era (Durr, 2015; Olito, 2021). During the mid-1800s, organized police departments began to form in Metropolitan areas, such as Boston in 1838, New York in 1845, St. Louis in 1846, Chicago in 1854, and Los Angeles in 1869 (Archbold, 2012; Olito, 2021).

Every local police force during this time in history has its own independent story. However, one commonality between them is that they had very little association with crime fighting and relied more on maintaining social inequalities (Shelden & Vasiliev, 2017). The quick transition from slave patrols to organized police forces, specifically in the American South, has a lot to do with the social and economic maintenance of White supremacy (Gruber, 2021). Many former Confederate soldiers that began to make up the justice system perpetuated the continued oppression of African Americans (Hassett-Walker, 2021). This oppression of African Americans was present when the Black Codes were passed in 1865, which was a predecessor to Jim Crow Laws (Gruber, 2021; National Geographic, 2023). Although the North did not have slavery to fuel the drive for enforcement agencies, the North did use the increase in immigration of non-American White people and the interests of wealthy families to justify their creation of policing agencies (Gruber, 2021; Parks & Kirby, 2022; Reichel, 1991).
The forefathers of current law enforcement agencies are responsible for the structure and many of the common administrative policies that we see in policing agencies today. It was during this time that the link between police departments and politicians became salient, which became known as the political era of policing. Local politicians, specifically the mayor, would control all administrative details of police departments (Archbold, 2012; Brandl, 2021). Corruption of police departments ran rampant (Monkkonen, 1992; Olito, 2021; Potter, 2013). Politicians reportedly paid off police departments to ignore illegal activities (Olitio, 2021), soliciting prostitution in exchange for services (Monkkonen, 1992), and police officers exercised excessive use of force in detaining citizens (Potter, 2013).

The “Father of Modern Policing,” August Vollmer, changed the trajectory of policing, citing sociological and psychological research as ways to transform police officers into professionals. Vollmer often described the police officers of that time as “unintelligent and untrained,” while other scholars believed them to be untrained and unprepared (Archbold, 2012; Brandl, 2021; Olito, 2021; Sloan & Paoline, 2021; Vollmer, 1936; Wilson, 1953). While Vollmer’s methods were incorporated into the administrative foundation of American police departments, the cultural foundation of these police agencies took a different approach. Although the aim for Vollmer was to decrease police agencies’ political dependence (Monkkonen, 1992), the influence of politics by way of U.S. President-backed policies created aspects of police departments that we continue to see today.

One notable addition to the history of the policing is the “crime fighter model” developed by FBI director, J. Edgar Hoover (Hover, 1961), which solidified police department’s cultural norms, ensuring that officers saw themselves as crime fighters and authoritarians (McLean et al., 2020; Paoline, 2004). This initiative was co-opted by President Richard Nixon’s “tough on
crime” approach. The legislation that followed was the United States Justice System’s way of changing police departments into agencies with the sole purpose of crime control (Gruber, 2021; Olito, 2021). As police departments transformed into crime fighting conglomerates, their relationship with the public became more strained. During this time, police agencies became less focused on community-based policing and more focused on crime control (Archbold, 2012; Bhattar, 2021; Brown, 2020).

Times of social strain created a piece of police history that was rooted in its foundation as slave patrols, but also created new territory for its space as oppressors of minority citizens in a nation coined the world’s Melting Pot. The Civil Rights Movement and the Stonewall riots in the 1960s highlighted the discriminatory aspect of policing (Gold & Norman, 2019), with images of police hosing down Black civilians and brutalizing LGBTQ+ individuals now being the representation of those historical moments. Police officers utilized tear gas, water hoses, and police dogs to attack Black people during protests and sit-ins (Bhattar, 2021; Echols, 2022; Potter, 2013). Police agencies in New York raided LGBTQ+ bars, brutalizing patrons and calling them slurs (Allyn & Matias, 2019; Wiley & Guzman, n.d.). Such atrocities were not limited to local police departments. Texas Rangers kidnapped and murdered Mexicans and Mexican Americans well into the 1920s before becoming a sector of the Texas Department of Public Safety in 1935 (Michael Barnes, 2018; Texas Department of Public Safety, n.d.). Instances such as these, and the many that followed, highlighted that police have always depended on enforcement as a cornerstone of profession.

After studies found that increasing police presence in neighborhoods did not reduce crime or make communities feel safer (Kelling et al., 1974), police agencies began to focus on increasing community engagement. During the 1970s and into the 1990s, police agencies chose
community relationships over typical hypervigilant skepticism (McLean et al., 2020). The core idea of community policing centered around policies and practices that included citizens in policing processes (Archbold, 2021; Oliver & Bartgis, 1998). These initiatives came in the form of prevention education programs, such as Red Ribbon Week, and youth programs, such as Stranger Danger (The Maryland Police and Correctional Training Commission, n.d.; Twyman, 2022). However, that transformation was short lived with the Columbine High School shooting in 1999 and the 9/11 attack that followed in 2001. These events prompted a shift back to an enforcement and crime control focus and helped to create the next arm of police agencies which was utilized across the United States, known as police militarization (Gau & Brunson, 2010; Olito, 2021).

The framework for the militarization of policing was established during the era of J. Edgar Hoover and the war on crime. President Lyndon B. Johnson (1966) said, “The front-line soldier in the war on crime is the local law enforcement.” Police officers being seen as soldiers reflects their aim to be seen as disciplined, commanding, and prepared (Steidley & Ramey, 2019). The logistics of said militarization became a focus of many police agencies in response to large scale threats (Archbold, 2012; Flood, 2011) such as 9/11 and Columbine. Police militarization is thought to look like armored vehicles, body armor, and officers toting AR-15s, e.g., SWAT (special weapons and tactics) teams. However, the militarization of police is incorporated by changing the framework of policing so that it mirrors the branches of the military as opposed to that of public servants (Steidley & Ramey, 2019).

The change in internal organization of police agencies happens in multiple facets, according to Kraska (2007): (1) acquisition of weapons and equipment designed to incite violence, (2) adoption of military values, appearances, and language, (3) implementing military
hierarchy to manage police employees, and (4) conducting police work in an aggressive, military fashion. These changes in local and state police agencies are much like what we see across the country today; formally known as a paramilitary policing model. Paramilitary policing has become a hot commodity. The increase in police training centers throughout the United States reflects this shift. There are 69 police training facilities in various phases of construction throughout the country (Is Your Life Better, n.d.), with the most infamous being “Cop City” in Atlanta, Georgia.

Shifts in policing has not always been linear, and every iteration of policing agencies has affected the public, both negatively and positively. To combat the unpleasant effects that years of law enforcement legislation has bestowed upon American civilians, federal efforts, such as the Task Force on 21st Century Policing enacted by President Barack Obama, aimed to identify best practices and offer recommendations for how police agencies can better balance crime reduction and public trust. These recommendations included six pillars: building trust and legitimacy, policy and oversight, technology and social media, community policing and crime reduction, training and education, and officer wellness and safety (Department of Justice, 2015). Many of these pillars are the main focus of many police reformists, suggesting that these changes will help communities feel safer with their local law enforcement and improve citizen-police relationships (Fair, 2023; Green et al., 2022). Though the recommendations for police reform may lie in administrative procedures, the attitudes that accompany these procedures is ingrained in the fabric of police culture.

Aspects of police culture

While the law and police executives determine what police officers do within the parameters of their job, police culture determines how police officers operate within those
parameters. Police culture determines officers’ attitudes toward their job (Paoline, 2004), their attitudes toward citizens (Chan, 1996), and their reactions to departmental change (Gutschmidt & Vera, 2020). Police culture is often thought to be a monolith, based in cynicism, social isolation, and prejudice (McCartney & Parent, 2021; Paoline, 2003; Paoline, 2004; Worden, 1995). However, police researchers have found that police culture is more nuanced than originally thought. Research has shown that police officer culture would benefit from being thought of as a collective, which is conceptually different from being seen as a monolith (Ingram et al., 2018).

Police culture is derived from socialization processes, based out of individuals interacting with one another. As a result, it is a collective property shared amongst officers (Paoline, 2003; Triola & Chanin, 2023; Van Maanen, 1974). Like any other culture, whether occupational or otherwise, there are subcultures that reflect different aspects of what we know as police culture overall. This cultural melting pot is how citizens perceive police officers, both individually and as an aggregate. There may be a benefit in looking at police culture as a sum of its parts, rather than an average.

Literature has outlined police culture in a multitude of ways. While some authors focus on types of police officers, such as “tough cops” and “clean-beat crime-fighters” (Paoline, 2004), others have focused solely on the “warrior versus guardian” mindset (McLean et al., 2020). Differences in police culture can also differ based on the rank of the officers, how long they have been in the force, and the geographical location of their department (Conti, 2011; Ingram et al., 2018; Skolnick, 2008). It is also important to explore police culture through the lens of its individual characteristics, as opposed to categorization of those characteristics. More specifically, it is important to view how individual characteristics of police culture, as opposed to characteristics of individuals, can affect police culture and police agencies in general. Citizens
have stereotypes of how they believe law enforcement interact with others. The “racist cop” stereotype is one of the most perpetual stereotypes of law enforcement, but research has shown that it is a little more nuanced than originally thought (Tyler & Wakslak, 2004).

Similar to police work, police culture has gone through many iterations since the development of the New World. However, police culture has almost always been centered around the “blue code of silence,” characterized by occupational isolation and a “cover-your-ass” mentality (Skolnick, 2002; Thomas & Tufts, 2020). Blue solidarity is thought to have its origins during the professionalization era of American policing. During this time, officers found that if they were in the spotlight, it was regarding an unsavory mistake or violation (Paoline, Myers, Worden, 2000). As a result, police officers have avoided accountability for decades, from both within their profession and from outside (Roscigno & Preito-Hodge, 2021; Skolnick, 2002). Police culture also precedes racial, cultural, and geographical region, creating a space for anyone decked out in blue (Moskos, 2008). Research has also found that police officers find solidarity amongst officers to be one of their highest priorities (Cordner, 2017). The cohesiveness of police culture is founded on its paramilitary-like structure, creating an us versus them mentality in the name of public safety (Balko, 2013).

Another major characteristic of police culture is cynicism. Bred from the same realm of the warrior mentality, it emphasizes the need for skepticism against the public as a means of survival on the job (Gutschmidt & Vera, 2020; Paoline, 2004). Cynicism is a way for police officers to anticipate danger in their interactions with civilians (Paoline, 2003). Much of public cynicism within police work is context based. While some researchers find that officer cynicism is a protective factor for police (Reiner, 2010), others find that the cynicism toward the public is a behavioral manifestation driven by officers’ dissatisfaction with support from their
organization and community at large (Spencer et al., 2022). However, the general consensus is that abandoning skepticism toward citizens could result in dire consequences, for both the officer and the civilian, putting them into situations that they are ill-prepared for (Caplan, 2003). The characteristics of police culture are not developed independently of the institution. Police culture is created and maintained through a variety of indoctrination processes.

Schuck (2024) examined the “guardian” mindset of police officers, and how those characteristics can improve the relationship between citizens and police agencies. When police officers subscribe to the guardian mindset, they believe in less use of force, more procedurally just actions, and support de-escalation. The guardian mindset emphasized equity, restraint, communication (Stoughton, 2015). The guardian abides by the procedural justice and community policing models, where policing balances law enforcement and preserving citizens’ rights (Helfgott et al., 2018). When police officers embody the guardian mindset, they treat citizens in a more procedurally just manner; they are more respectful and focus on problem-solving, rather than solely law enforcement (Paoline, 2003; 2004). Police officers that do not subscribe to such an ideology may take a more traditional law enforcement approach. This is often referred to as the warrior mentality.

Stoughton (2015) highlighted the “warrior” mentality of police officers, and how it is instilled into police officers and maintained throughout their career. More specifically, how characteristics, such as hypervigilant skepticism, is introduced to officers as a means of survival; and their survival depends on having qualities of a warrior. In accordance with the warrior mentality is the “us versus them” mentality that is another common characteristic of police culture. Like the warrior mentality, the concept of being isolated from non-police individuals is considered a matter of life or death (Brough et al., 2016; Paoline, 2003; Reiner, 2010). These
characteristics are a part of the indoctrination of police. Boivin et al. (2020) found that police recruits become increasingly isolated from the rest of the population as they go through training. The isolation of police work is also tied to the nature of police work. From their distinguishable uniform and vehicles to their unconventional work schedules, police officers are different from non-police in a myriad of ways (Nhan, 2014). This differentiation further attributes to the sense of isolation and alienation, which is a huge component of police culture.

Police culture in a post-9/11 era is much like what we see in many police forces across the United States today. Entire police departments began to revert to the core concepts of policing: crime-fighting, warrior mentalities, and being detached from the communities they police (Paoline & Terrill, 2014). The resulting characteristics are often rewarded throughout the careers of officers (Paoline, 2003). These feelings are often coupled with perceived public antipathy, which may act as confirmation bias for police officers. Officers that have perceived greater public antipathy are also more likely to promote higher social isolation and cynicism toward the public (Marier & Moule Jr., 2019). Officers often view themselves as the line between good and evil (Chan, 1996). Placing themselves on a moral high ground allows police officers to have many cynical views of citizens, especially when paired with hypervigilant skepticism (Ingram et al., 2018; Van Maanen, 1978).

Police culture indoctrination

As United States police forces changed, police officers collected important pieces of each iteration of police agencies. This created a cultural melting pot within police departments that is passed down to new recruits through workplace indoctrination processes (Branch, 2021; Van Maanen, 1974). These indoctrination processes often begin in the police academy and continues throughout the officers’ careers (Chappell & Lanza-Kaduce, 2010; Van Maanen, 1974).
Although there is an immense amount of literature surrounding police recruits and the content of the training in the police academy (Blumberg et al., 2019; Marion, 1998; O’Neill et al., 2019; Rossler & Suttmoeller, 2018; Sloan & Paoline, 2021), there is less research regarding its effects on police officers’ attitudes. Researchers often look at the effects of the police academy on career success of recruits (Chappell, 2008) or the educational standards of the police academy (Davies, 2017). It is important to identify how the police academy is developed as a form of “adult socialization” for police recruits, preparing them for the dangerous nature of police work, and how training in the police academy has doubled as a mode of indoctrination for new police recruits (Branch, 2021; Chappell & Lanza-Kaduce, 2010; Little, 1990).

When discussing values of police departments, the conversation often turns into a causality dilemma. Do individuals with specific characteristics go into policing or do police agencies breed individuals with specific characteristics? Overall, there is very little evidence to suggest that specific types of individuals go into policing. However, there is a plethora of literature that socialization within police agencies influences officers’ attitudes toward topics such as use of force (Oberfield, 2012), community policing (Haarr, 2001), and identifying with their communities (Boivin et al., 2020).

The socialization referenced in police academy literature is known as organizational socialization. Organizational socialization is the process of learning what is important to an organization and how that organization operates (Schien, 1988). Conceptually, the organizational socialization regarding police officers is centered around enforcing the law, maintaining social order, and preventing crime (McLean, et al., 2020; Paoline, 2003). This is referred to as the explicit values of the American police academy. However, police academies provide socialization based upon both explicit and implicit values (Engelson, 1999). Police academy
curriculums follow similar standards: formal education, experiential exercises, and physical activity (Little, 1990; Oberfield, 2012), which reflects the explicit values that are standard for nearly all police academies around the United States. The lesser known, and unofficial, curriculum in police academies, and subsequently the departments the officers are assigned to, is based upon recruit interactions with each other, their instructors, and existing police officers (Branch, 2021; Conti, 2006). This process of passing on organizational norms within police agencies has been thought of as top-down process, where leadership indicates that certain behaviors are normal and the behavior trickles down the ranks (Gubler et al., 2016; Larkin & Pierce, 2015; Mayer et al., 2009; Pierce & Snyder, 2008).

However, there is alternative research suggesting that intergenerational transmission of beliefs amongst lower rank officers is responsible for the maintenance of ideals within police departments. Frake & Harmon (2023), found that officers that engage in misconduct earlier in their career engage in misconduct for longer periods of time, and allow misconduct from their subordinates once they achieve higher ranks as a police officer. It is believed that intergenerational transmission of police culture may be responsible for the implicit values that have become an important aspect of policing. While the explicit values of the police academy are usually the focus of policing research (Sloan & Paoline, 2021), centering implicit values, and their transmission, should be considered in policing research just as much.

Additionally, the aspect of police socialization is so widespread that individuals that aim to go into policing will engage in anticipatory socialization, where they engage in careers and behaviors that place police officers as role models. This is seen in research done by Conti (2006), where potential applicants would engage in parallel jobs, such as a bailiff, corrections officer, or dispatcher. Their main objective is to gain professional capital in hopes of being accepted to a
Police academy. Many of the individuals interviewed in this study named their ties to the policing community and wanted to be a part of the agency legacy. This finding brings forth questions regarding how police organizational values, specifically police culture, are relayed and how it is strong enough to permeate non-police communities.

*Police culture and its influence on officer behavior*

Whether being explored individually, as a collective, or as monolith, police culture researchers have reached a consensus that overall police culture influences police behavioral outcomes. The most notable behavioral outcome of police culture is the usage of force. Terrill et al., (2003) found that “traditional” police officers, operationalized as those that are highly aggressive and selective, were more likely to use higher levels of force. Paoline and Terrill (2005) also found that officers with “traditional” police values were more likely to conduct searches during traffic stops on Black and Brown citizens. Over a decade later, their research was replicated by Ingram et al. (2018), who found that a workplace culture of citizen distrust was associated with higher usage of force among officers. Similarly, McLean et al., (2020) determined that officers with warrior mindsets were highly associated with more positive attitudes toward use of force misconduct and weaker beliefs in communication with citizens and community.

Another common behavioral outcome associated with police officer culture is their interactions with citizens. Research found that officers that adhered to their role as a “crime-fighter” was associated with more citizen complaints than those that did not (Terrill & Paoline, 2015). Silver et al., (2017) also found that police officers that adhered to traditional police culture did not support treating citizens in a procedurally just manner. Ingram et al., (2018) also found that workgroup culture was related to citizen complaints, and there was a difference
depending upon which departments officers worked in, e.g., agency size or type. These characteristics of police officers continue to drive a wedge between the occupation and the communities they serve (Keller & Moore, 1988; Skolnick, 2011; Terrill et al., 2003). That wedge can affect how citizens perceive police officers as an occupation, how citizens perceive the police officer as an individual, and how citizens perceive their interactions with a police officer. While the concept of police culture influencing officer behavior is not a new concept, it has become a hot topic in criminology and psychological research as researchers investigate characteristics that may lead to the unfavorable outcomes that is becoming increasingly associated with police-citizen interactions (Williamson et al., 2023).

To draw a connection between literature regarding police culture and that regarding how citizens perceive police officers, we must consider how police culture contributes to behavioral outcomes that then erode the relationship between citizens and police. Police culture can manifest in police officer behaviors. When police officers align with characteristics that are consistent with a traditional police officer, their behaviors will reflect that of someone who is aggressive or disrespectful (Paoline & Terrill, 2005). Citizens will have unsavory perceptions of police when they feel that they have been treated with disrespect and unfairly (Hough et al., 2010).

**The relationship between citizens and police officers.**

The relationship between citizens and police officers is characterized by mutualism, where mutualism is defined as a belief that mutual dependence is necessary for benefit of social welfare (Merriam-Webster, n.d.). Citizens and police officers have perceptions of one another that is imperative to understanding the dynamic of their relationship. How citizens perceive police officers overall has been well documented (Campbell & Valera, 2020; Hadar & Snortum,
Citizens’ perceptions of police interactions govern their trust of police, perceptions of police legitimacy, and willingness to cooperate with police (Madon & Murphy, 2021; Mazerolle et al., 2013a; Williamson et al., 2023). What police officers expect from citizens has also been well documented, though not to the same veracity (Chan, 1996; Paoline, 2004; Pickett & Nix, 2018). However, it is important to focus on how each group perceives each other, where those perceptions stem from, and how it affects their overall relationship.

**Citizens’ perceptions of police officers**

How citizens perceive police officers can affect whether citizens obey the law (Solomon, 2019; Tankebe, 2013), cooperate with the police (Sunshine & Tyler, 2003b), and report crimes (Rengifo et al., 2019). Research found that citizens that perceive police officers are being more procedurally just, legitimate, and effective were more likely to positively engage with police than individuals that did not have these positive perceptions of the police (Rengifo et al., 2019; Sunshine & Tyler, 2003b; Tankebe, 2013). Due to the strong connection between citizens and police, citizens have opinions about a variety of aspects of policing. Citizens support police departments wearing body cameras and they also believe that it will change officer behavior. However, citizens do not believe the use of body cameras will increase trust between police and their communities (Wright & Headley, 2021). Citizens also do not support use of force, even if it is seen as a *legally reasonable* amount (Mourtgos & Adams, 2020). However, there are differences in how citizens view police officers. These differences may lie in looking at citizens based on demographics, as opposed to overall.

The history of policing has a direct effect on citizens’ perceptions of police officers (Carmichael et al., 2021). Their history overwhelmingly affects ethnic, religious, and racial
minorities, but also affects individuals with less education and of lower socioeconomic status (Zhao et al., 2014). As a result, particular demographic groups have different perceptions of police agencies. Ethno-racial minorities tend to have less favorable perceptions of police when compared to their White counterparts (Oliviera & Murphy, 2015; Renauer & Covelli, 2011). Cisgender women also had more favorable attitudes toward police officers (Bolger et al., 2021), relative to their trans counterparts who reported more negative attitudes toward police (Serpe & Nadal, 2017).

Differences also exist in how certain people are treated during police interactions. Motley Jr. & Joe (2018), found that being male, above 35 years old, and having an income under $20,000 made individuals more likely to encounter excessive use of force, regardless of race. These results were replicated by Paoline et al. (2021) who found that officers use higher levels of force for individuals that are male, non-White and displayed signs of mental impairment. These differential perceptions and outcomes are often due to the nature of police interactions, disproportionate surveillance by police, and highly publicized instances of police brutality (McManus et al., 2019; Murphy et al., 2018; Williamson et al., 2023).

The discrepancies in these relationships are seemingly by design. In 2023, Hassan reported that 40% of a police force in Antioch, California engaged in a racist text chain. Linly (2023) found that same text chain included the president of the local police union. Even without the privacy of a text chain, White police officers have also taken to social media to express their disdain with Black people. Former officer Aaron Paul Nichols, a self-proclaimed Neo-Nazi, of Springfield, Illinois took to a forum under a secret account to write “When I seize power, ‘hate crimes’ will be encouraged”; “N****s ruin everything.” (see Table 1; Pickett et al., 2022). In
addition, at least 31 police officers were involved in the January 6th insurrection on the Capitol, many of whom were White police officers.

Citizens’ perceptions of police are also based upon the tone of their interactions with police. Research has shown that individuals that have positive experiences with police have more positive perceptions of police (Madon & Murphy, 2021; Mazerolle et al., 2012; Nofziger & Williams, 2005). Individuals with negative experiences with the police have more negative perceptions of police (Akinlabi, 2020; Jackson et al., 2021; Renauer & Covelli, 2011). Much of the literature concerning citizens perceptions of police officers is based on the outcome of their interactions with police (Carmichael et al., 2021; Engel, 2005; Pollock & Menard, 2015). However, there is evidence that if citizens believe they are treated fairly, they are less concerned about the outcome of the interaction and have more positive views of police officers than those treated unfairly (Tyler & Huo, 2002). Citizens’ perceptions of police are not only based on their personal experiences with police, but also based on the experiences of others.

*Direct and vicarious experiences with police*

The literature surrounding the relationship between citizens and police officers all have a commonality regarding the link to how communities interact with police and their experiences overall. The focus on these experiences between citizens and police is very important, from both the perspective of citizens, and from the perspective of the officers themselves. These foci tell a lot about the nature of the relationship between officers and the communities they police (Madon & Murphy, 2021; Tyler & Wakslak, 2004; Williamson et al., 2023). Due to the scope of jurisdiction of law enforcement, many individuals have either had experience with police officers directly or knows someone who has. As a result, both direct and vicarious experiences with
police officers can affect the relationships between citizens and police officers (Lim & Lee, 2021; Rengifo et al., 2019).

Individual, direct experiences with police agencies can affect how individuals perceive the police officers and law enforcement agencies as a whole (Klein et al., 1978; Van Damme, 2017; Solomon, 2019). It is nearly impossible to encounter someone who does not have an opinion on police officer. When individuals have a personal experience with police, they use that experience to form their opinions about police officers and the law, regardless of their symbolic attitudes toward police (Orr & West, 2007) or their race (Alberton & Gorey, 2018).

The nature of the direct experience with police should also be taken into consideration. Rosenbaum et al. (2005) found that citizens have higher expectations of police interactions when it is a citizen-initiated contact relative to police-initiated contact. In this study, negative citizen-initiated experiences resulted in more negative attitudes toward police while negative police-initiated experiences had no such effect. Additionally, Jackson et al., (2012) found that negative police-initiated contact resulted in more negative perceptions of police legitimacy and procedural fairness than citizen-initiated contact. The differences in these results may lie in demographic differences. Ethno-racial minorities and those of lower socioeconomic status are more likely to have involuntary contact with the police, and are also more likely to have negative perceptions of those experiences (Alberton et al., 2019; Carmichael et al., 2021; Slocum, 2017). These negative experiences with police, whether police-initiated or citizen-initiated, affects citizens’ willingness to report crimes and perceptions of treatment by police (Regnifo et al., 2019; Slocum & Wiley, 2018). Overall, direct experiences with police officers can give citizens the opportunity to either reinforce or undermine legitimacy and trustworthiness of police (Bradford, 2010).
Experience with the police not only affects the lives of the people involved, it can have a domino effect, affecting the lives of anyone in the vicinity. Research has shown that, similar to direct experiences, vicarious interactions with police are associated with changes in attitudes toward police (Rosenbaum et al., 2005). These interactions between the citizen and an officer often generalize to perceptions of the entire police organization (Van Damme, 2017). As a result, communities, especially minority communities, have varying perceptions of police agencies that are affected by personal experiences as well as experiences portrayed by fellow community members and through mainstream media (Oliveira & Murphy, 2015; Renaur & Covelli, 2011; Van Craen, 2012; Williamson et al., 2023).

Vicarious experiences with police have become more widespread due to the presence of social media. As a result, individuals are developing opinions of police based on depictions of police in the media (Campbell & Valera, 2020; Intravia et al., 2020; Walsh & O’Connor, 2019). Vicarious negative experiences via media can elicit psychophysiological and affective responses similar to direct experiences with police officers. Sosoo et al., (2022) conducted a study using pictures of police violence and found that individuals exposed to the police violence pictures had greater psychophysiological and negative reactivity than those that received neutral or non-violent stimuli. Similarly, Wilson et al., (2021), found that social media is a source of vicarious experiences influencing Black and Latina women’s perceptions of police. As social media is a huge component of everyday life, there is an increasing focus on how social media is being used as a means of experience between police and the public (Hockin & Brunson, 2018).

Direct contact with police officers can affect various aspects of citizens lives, even at a young age. Gottlieb & Wilson (2019) found that teenagers that had direct contact and vicarious contact with police are associated with less educational attainment, even if the contact with
police did not result in an arrest. Similarly, research also found that teenagers with both direct and vicarious contact with police were skeptical of the legal system (Hofer et al., 2019) and have lower levels of respect for police and confidence in the police (Harris & Jones, 2020). Contact with police at early stages of life, even vicarious contact, can have long-term effects on adolescents. In the Pathways to Desistance longitudinal study, it was found that contact with police, whether direct or vicarious, was negatively associated with future orientation, or the extent to which someone thinks about their future. More importantly, the contact with the police, regardless of how just or unjust the contact was, may act as an event that changes the life-course of the adolescence (Testa et al., 2022).

Empirical evidence has shown that negative contact with police has a strong negative effect on citizens’ perceptions of police, while positive contact with police has a weak positive effect (Myhill & Bradford, 2012; Skogan, 2006; Trinkner et al., 2018). As a result, interactions with police would almost require a positive perception from citizens in order to change their perceptions of police, no matter the terms of the interaction. During citizen-police interactions, citizens are judging police primarily based on the quality of treatment they receive. So much so, that individuals that receive fair and respectful treatment are less concerned about the outcome of the interaction and focus more on how they are treated (Tyler & Huo, 2002). This sentiment is replicated by Solomon (2019), who found that individuals that viewed officers treating citizens with respect were more willing to cooperate with the officer, obey the officer, and reported being more trusting of the officer. Citizens’ perceptions of police are rooted in how they are treated by police. How officers treat citizens is often a reflection of how police perceive citizens.

*Police perceptions of citizens*
Very seldom are perceptions of citizens explored from a policing standpoint. A cornerstone of police culture is their cynicism and lack of trust toward citizens. During the recent years, the traditional police officer identity as a “crime fighter” or “warrior” has become a point of contention between police officers and police reformists. More specifically, this aggressive mindset has decreased legitimacy and strained the relationship between police officers and the communities they serve (Department of Justice, 2015). This narrative is corroborated by police officers. Officers have reported feeling more callous toward citizens upon becoming a police officer (Morin et al., 2017). Police officers are often distrusting and suspicious of citizens that seek police service (Crank, 2004).

There are also differences in police officers’ perceptions of how the community perceives them as a function of length of service in the police force. Police officers that have been in the police force longer feel more support from citizens (Moon & Zager, 2007), but identify with citizens less (Boivin et al., 2020). Police officers who were on the job longer also reportedly used higher levels of force (Paoline et al., 2021). Officers’ views on citizens and their propensity to engage in excessive force while interacting with citizens affects how citizens view police officers, which in turn, affects how officers view citizens.

Officers believe that they set the moral standard, and disrespect of officers is a “moral transgression” (Van Maanen, 1978). Due to their idea that they are the law, to disrespect an officer is the same as disrespect of the law. Officers who believe that citizens are not treating them with respect are less likely to treat citizens with respect and are more likely to take a “tough cop” policing style during the interaction (Pickett & Nix, 2018). Officers are also more likely to feel frustrated, annoyed, and perceive more danger when they perceive citizens as being disrespectful (Nix et al., 2019).
Similar to the research on citizens, officers’ perceptions of citizens affect their behavior when interacting with citizens. Dai (2021) found that when officers are treated with respect and citizens are compliant, they are more likely to treat the citizens with respect. Similarly, when officers feel that they are disliked by the public, they are more aggressive toward citizens (Marier & Moule Jr, 2019). Due to the nature of their job, police officers tend to generalize citizens. Instead of basing their perception of incident-specific approaches, police officers often believe that their time on the job has allowed them to make quick judgments about citizens, placing citizens into permanent groupings, regardless of the current situation (Engel et al., 2012; Van Maanen, 1978). It is important to note how police perceptions of citizens influence their behavior, however it is also important to discuss how those behaviors influence how citizens perceive police.

The influence of police officer behavior and race of the police officer on citizens’ perceptions

Descriptive representation in police departments has become a hot button topic in policing over the years. Increasing diversity in police departments is a concept that is continuously being pushed by the federal government. One of the prevalent recommendations made by the Department of Justice (2015) was to find ways to build relationships with ethnic minority groups, immigrant communities, gender minority groups, and disabled individuals. Since citizens’ perceptions of police rely heavily on their lived experiences with police officers of a particular demographic (Headley et al, 2021), focusing on the nuances of identity between citizens and police officers is important when finding ways to strengthen their relationship. When individuals see themselves reflected in police departments, they have more positive feelings towards that department (Stauffer et al., 2023). This amplifies the need for more ethnically diverse police departments. The push for diverse police departments is not a new
social concept. Various police reformists have suggested that increasing diversity within police departments can increase understanding between police officers and the communities they police (Fair, 2023; Green et al., 2022; The Associated Press, 2021).

Diversification of the police force has been a long-term topic of police reform. Despite being highlighted by the Department of Justice’s President’s Task Force on 21st Century Policing (2015) as an important part of advancing police and community relations, there is very little empirical research surrounding how diversity in police departments affect citizens’ perceptions of police, both individually and as an agency. Law enforcement has been a historically White institution (Bolton & Feagin, 2004; Dulaney, 1996). As a result, the preconceived notion of police officers is that they are inherently White and are directly linked to the atrocities surrounding the conception and maintenance of the police force. The racial divide between Black Americans, and other people of color, and the police affects their perspectives of police officers and the agencies they serve (Pickett et al., 2022).

Diversifying the police force could also result in a reduction in the fear of police officers. Research substantiates this claim. Pickett et al., (2023) found that Black Americans were less afraid when police officers were non-White. These sentiments are supported by Riccucci et al., (2018), suggesting that the mere representation of minorities in policing decreases minority civilian fear, independent of officer behavior. The benefit of diversifying police also applies to women. Riccucci et al. (2016) found that adding women to a police department increases female citizens’ obligation to cooperate with police. Although diversifying police officers may not be a catch-all solution for decreasing fear of police in minority communities, empirical literature has shown that it aids in the relationship between police in minority citizens. However, when the
majority of police officers are White (Data USA, 2021), shifting focus to White officers’ relationships with minority communities is extremely important.

Diversifying police departments is not just about diversifying the look of the department, it is also about diversifying the way police officers interact with their communities. Ba et al., (2021) found that Black and Hispanic officers made fewer stops, fewer arrests, and used less force than their White counterparts. It is also noted that these disparities are driven by discretionary decisions made by police officers. While White officers are more likely to harass Black and Brown civilians, minority officers are less likely to approach all citizens with an attitude based strictly on enforcement (Ba et al., 2021). However, there is mixed evidence regarding whether diversifying police departments reduces adverse experiences for citizens, particularly ethno-racial minorities. While Nicholson-Crotty et al. (2017) found that ethno-racial minorities are less likely to be discriminated against by Black officers, Shjarback et al. (2017) found that there are no differences in racial disparities of police stops when police departments are more diverse in relation to the communities they police.

There are also racial differences in police-citizen interactions that involve officer discretion. Headley & Wright II (2020) found that, when looking at decisions that allow for officer discretion, Black officers are less likely to use higher levels of force against Black civilians; but in instances where there was no discretion, such as arrests, Black police officers did not differ from their White counterparts. These discretionary interactions influence officer behavior, and therefore, influence the outcome of the interaction and citizens perceptions of police. As a result, it is important to focus on how police officers can manage their behavior and change the narrative of their relationship with the public. Tyler & Wakslak (2004) found that when citizens experience officers that are polite, respectful, and acknowledge their rights, they
are less likely to feel that they are being profiled and are more likely to accept the decision made by the police officer. This finding is also replicated with research by Trinkner et al., (2018), which suggests that when police officers are respectful and impartial, the boundaries of their authority are seldom questioned. As a result, citizens are more likely to obey the police and obey the law. While citizens’ perceptions of police behavior are important in investigating the relationships, citizens perceptions of the police officers themselves are also important. This is seen in police reform literature highlighting police agency diversification. These behaviors are often denoted by procedural justice, or the notion that fairness in experiences affect perceptions of experience quality.

Police officer and citizens interactions do not happen in a vacuum. Due to the history of law enforcement agencies, police officers are subjected to preconceived judgments (Madon & Murphy, 2021). As a result, citizens develop opinions of police characteristics, outside of their uniform and weapon. Police officer characteristics can change how citizens view police officers before words are exchanged. As a result, it is important to consider how these characteristics affect citizens’ perceptions of police legitimacy and trust.

**Procedural justice**

The construct of procedural justice was initially developed by W. Laurens Walker, a law professor, and his colleagues in 1974. This initial study showed that the fairness of the procedure, no matter the outcome, increases acceptance of a decision. While Walker and Thibaut continued to pave the way for procedural justice, it was not until later that researchers, such as Lind & Tyler (1988), identified the relationship between procedural justice and respect of authority.
Shortly thereafter, research by Tyler (1989) posited that individuals were more likely to obey the law if they perceived their encounters with police to be fair. At this time, procedural justice was being referred to as a part of a *relational model of justice*, which is part of a model linking concerns about social justice with concerns about social bonds between people and other groups, institutions and authorities (Tyler, 1994). In this study, it was found that individuals tie characteristics such as neutrality, standing, and trustworthiness, to legal authority being procedurally just.

Tyler and his colleagues continued to publish numerous empirical works outlining the different components of procedural justice (Tyler, 2000), the benefits of procedural justice for legal actors (Tyler, 2003), how procedural justice shapes citizen compliance with police (Sunshine & Tyler, 2003a; 2003b), and how procedural justice influences support for police (Tyler & Wakslak, 2004). It was at this time that Tyler and Huo (2002) began to establish procedural justice as a *process-based model of regulation*. More specifically, the procedural justice model posits that when processes, such as procedural justice, are applied to police and citizen interactions, it is more important in predicting satisfaction and legitimacy than the outcome of those interactions and are, therefore, more likely to abide by legal obligations (Tyler, 2003; Tyler & Huo, 2002). From there, countless researchers applied the procedural justice model to explain the relationship between the public and law enforcement agencies (e.g., Bottoms & Tankebe, 2012; Gau & Brunson, 2010; Mazerolle & Terrill, 2020; Mazerolle et al., 2013b; Pickett et al., 2018). However, the sake of this paper, I will focus on the procedural justice model as it is currently, and its effects on the relationship between citizens and police.

*The procedural justice model*
The procedural justice model denotes that police trust depends on procedural justice and perceptions of effectiveness (Hough et al., 2013; Jackson et al., 2012; Sunshine & Tyler, 2003b; Van Damme et al., 2015). According to Tyler (2000), in order for an interaction to be seen as procedurally just, individuals must: (a) feel like they are a participant in the resolution of the interaction, (b) believe that authorities involved are neutral and free of bias, (c) feel that they can trust the motives of the authorities that they are interacting with, and (d) believe that they are being treated with respect and dignity. Hough (2012) extended the work of Tyler (2000) and found that procedural justice is operationalized by police being fair, respectful, and unbiased. Procedural justice is also characterized by the quality of citizen treatment and police decision-making (Van Damme et al., 2015).

Police officers behaving in a procedurally just manner influences citizens’ behavioral outcomes with police. When citizens believe that police officers are treating them procedurally just, they are more compliant, cooperative, and engaged during their interactions with police (Bradford et al., 2014; Madon & Murphy, 2021; Tyler & Jackson, 2014; Tyler, 2017). Research has shown that citizens judge police officers based on the quality of the treatment they receive and are less outcome oriented (Tyler & Huo, 2002). When citizens feel that they receive fair and respectful treatment from police officers, it more important than advantageous outcomes (Hough et al., 2010). This sentiment is reflected in those that have already received negative outcomes. White and colleagues (2016) found that even criminally involved individuals value procedural justice in their perceptions of police legitimacy.

The procedural justice model is unique in the sense that it relies on citizens obeying the law for reasons outside of fear of punishment (Tyler, 2006b). Citizens make the determination of their own behavior based on how they perceive their treatment by police during interactions.
Maguire et al. (2017) found that when individuals were exposed to officers exhibiting procedurally just behaviors, they were more likely to cooperate with police and feel more obligated to obey the officer’s directives than individuals exposed to neutral or negatively behaving officers. Whereas individuals that were exposed to officers exhibiting procedurally unjust behaviors, they were less likely to cooperate with police and felt less obligated to obey the officer’s directives than individuals in the other two conditions. Since citizens’ behaviors are often determined by the behaviors of police officers, it is important to focus on how police behavior can reflect procedural justice.

*Procedural justice and police behavior*

Procedural justice outlines the way citizens are treated by police during police encounters. While scholars have operationalized procedural justice as either fair or unfair treatment, legal literature posits that procedural justice focuses on both the quality of treatment and the quality of decision-making (Sunshine & Tyler, 2003b; Tyler, 2003). Small changes in policing behavior can indicate a shift toward more procedurally just interactions, such as police tone and use of respectful language during citizen interactions (Solomon, 2019). It is important to imbed procedurally just behaviors into police training and within police culture. Mazerolle & Terrill (2018) reported that police officer and citizen interactions would benefit from police being trained to behave in procedurally just ways. This need is reiterated by the Department of Justice (2015), where it was recommended that procedural justice be imbedded in internal organizational culture of police departments, especially in discipline processes, as it would strengthen the relationship between police and citizens.

There is a need to focus on noncoercion and everyday incidents, as opposed to utilizing only volatile incidents as a means for training. The need to change police culture to reflect
procedurally just behaviors comes from evidence that even with training and supervisory oversight, police officers are adhering to these behaviors for a short period of time (Thompson, 2018). This finding highlights the need for procedural justice to be imbedded in institutions, work groups, and individuals. However, that may be difficult to do when the target individuals are unaware of the problem. Many officers do not believe that they, or their colleagues, behave in procedurally unjust ways. Gau & Paoline (2020) found that police officers believe that their colleagues treat citizens equitably, regardless of race or socioeconomic status. The presentation of these behaviors and characteristics in police officers affect citizens’ perceptions of police legitimacy and trustworthiness.

Procedural justice can manifest in a variety of ways, many of them reflecting in behaviors of police officers. Treating citizens in a procedurally just manner is a crucial part of the relationship between citizens and police (DOJ, 2015). As a result, examining how procedurally just interactions can affect citizens’ perception of police when combined with discretionary outcomes and police officer characteristics can fill a substantial gap in empirical literature.

Police Legitimacy

Police legitimacy refers to citizens’ recognition of police authority and their ability to fulfill their job duties. For police to be seen as legitimate, citizens must feel obligated to respect their authority and voluntarily comply with their directives (Bottoms & Tankebe, 2012; Tyler, 2006a). Although the concept of police legitimacy is mentioned for quite some time, it was not operationalized explicitly until 2004. (Tankebe, 2014; Tyler & Wakslak, 2004). Initially, Weber (1978 [1922]) determined that legitimacy represented three types of authority: charismatic, traditional, and legal-rational authority. Charismatic authority relies on individual qualities, indicating that the legitimacy of power relies on charisma and exemplary character. Conversely,
traditional authority is tied to customs and tradition and legal-rational authority is based in legal rationale and bureaucracy.

Weber believed that the realm of legitimacy solely existed within the parameters of the law. Since then, researchers argued that Weber was conflating legitimacy with legality (Coicaud, 2002; Lassman, 2000). Following up on Weber’s work, many researchers sought to determine how police legitimacy is conceptualized. It was determined that police legitimacy is conceptualized based upon individuals’ obligation to authority (Sunshine & Tyler, 2003b; Reisig & Lloyd, 2009; Tyler & Huo 2002; Tyler et al., 2010). Even then, researchers could not determine if the obligation citizens had to authority was morally based, legally based (Bottoms & Tankebe, 2012), or because citizens were feeling a sense of powerlessness (Jackson et al., 2010). While legitimacy has been an important part of investigating relationships between citizens and police, there is very little consistency between studies that measure police legitimacy. A systemic review found that while there are many studies looking at police legitimacy as a predictor of behaviors and perceptions, research looking at police legitimacy as an outcome lacks randomized experiments, leading to a lack of psychometric consistency. More specifically, the incoherence in component parts of police legitimacy has led to an empirical impasse regarding what factors contribute to measuring police legitimacy. As a result, researchers find it difficult to compose further judgments regarding interventions affecting legitimacy, due to the problems raised concerning the operationalization and measurement of police legitimacy (Mazerolle et al., 2013b).

*Determinants of police legitimacy.*

Though the origins of police legitimacy have been discussed, there is relevance in what determines police legitimacy. Factors such as police performance and distributive justice during
interactions with citizens have been identified as influences to police legitimacy (Hinds & Murphy, 2007). However, procedural justice was identified as affecting police legitimacy more than the other variables. Reisig et al., (2007), found that both distributive justice and procedural justice were key drivers of police legitimacy. These findings were consistent with research from Sunshine & Tyler (2003b), which found that procedural fairness was the key driver of police legitimacy. Walters & Bolger (2019) also found that procedural justice predicted police legitimacy in longitudinal data. While it may be argued that other variables may predict police legitimacy for ethno-racial minorities and underserved individuals, Gau et al., (2012) found that even when controlling for macro level characteristics, such as neighborhood, homicide rates, and race, procedural justice was the strongest predictor of police legitimacy.

Taking an alternative, but still parallel route, Tankebe (2013) argued that police legitimacy was made up of four facets based on citizens’ perceptions of the following: (1) police effectiveness, defined as polices’ abilities to tackle crime and enforce the law, (2) distributive fairness, defined as whether individuals believe the outcomes themselves, and how they are distributed, is done without bias, (3) procedural justice, defined as the fairness of processes used to elicit a specific outcome, and (4) lawfulness, defined as behaviors in accordance to established laws. While police legitimacy and procedural justice are highly correlated (Gau, 2011; Reisig et al., 2007), Tankebe (2013) wanted to determine if the relationship between procedural justice and police legitimacy was reciprocal, where each variable predicted each other. However, Tankebe (2013) found that procedural justice and police legitimacy do not have a reciprocal relationship, and that procedural justice was the main driver of police legitimacy, but police legitimacy did not predict procedural justice. Similarly, Pina-Sanchez & Brunton-Smith (2020) found that there was no relationship when police legitimacy was used as a predictor for
procedural justice. These results were replicated by Trinkner et al., (2019). In summary, these sets of findings suggest that procedural justice is a predictor of police legitimacy, but police legitimacy is not a predictor of procedural justice.

Citizens’ perceptions of police legitimacy and its influences

The implications of citizens’ perceptions of police legitimacy are widespread. Citizens perceiving police as legitimate contributes to police effectiveness (Van Damme, 2013). When citizens feel that police are respectful and fair, they view them as more legitimate and are more willing to obey police and respect their authority (Van Damme, 2013). This finding is partially due to police legitimacy being positively associated with willingness to cooperate and voluntarily obey police (Bolger & Walters, 2019; Hough et al., 2013; Tyler & Fagan, 2008; Van Damme, 2017; White et al., 2016).

When citizens perceive police to be more legitimate, they are also more likely to support police and their policies. Moule et al., (2018), found that police legitimacy displayed a positive relationship with support of police practices of militarization. Along these same lines, police legitimacy is positively associated with use of force, but only within the legal limit. These results are not present for excessive force (Bradford et al., 2017; Gerber & Jackson, 2017). When citizens perceive police officers as more legitimate, they are also more likely to rationalize police misconduct. In a qualitative study, Ha & Sun (2023) found that when Asian Americans empathized with police, they also rationalized their individual instances of police misconduct. This rationalization was linked to increased police legitimacy. Conversely, when individuals perceive the police as less legitimate, they are less likely to report a crime (St. Louis & Greene, 2020).
One major, and relatively new, influence of police legitimacy is the differences in media consumption. Citizens that receive news through social media have lower scores on measures of police legitimacy (Intravia et al., 2018). Furthermore, when citizens are viewing negative social media posts regarding police or police interactions, they have lower perceptions of police legitimacy than those that do not consume such social media (Graziana, 2019; Intravia et al., 2020). Social media is not always linked to lowering police legitimacy. When police promote transparency online, it increases citizens’ perceptions of police legitimacy (Grimmelikhuijsen & Meijer, 2015). However, the bulk of exposure to police interactions online are not from police departments, but are from vicarious accounts of interactions with police either via police body camera footage or personally recorded videos.

Exposure to police brutality can also change citizens’ perceptions of police legitimacy. Following the murder of Michael Brown, St. Louis County residents reported lower perceptions of police legitimacy than before the shooting, but only if the residents were Black. Non-Black residents reported no change in police legitimacy as a result of the shooting of Michael Brown (Kochel, 2019). Kochel’s results were not uncommon. Fine et al., (2021) found that Black and Latinx individuals reported lower police legitimacy than their White counterparts. In Kruis et al. (2023), it was found that the racial differences in perceptions of police legitimacy lie in the differences in perceived procedural justice and police effectiveness. While the belief that the police can do their job is directly related to citizens’ perceptions of police, it is also important to explore whether citizens trust police officers to do their jobs and how that influences citizens’ perceptions.

Police Trustworthiness
Police trustworthiness is based in the belief that the police are fair, honest, and uphold the rights of citizens (Torres, 2017). Trust in the police is important because trust is the foundation of any political institution. Trust, particularly in governmental bodies, determines expectations and behaviors (Balliet & Van Lange, 2013; Mishler & Rose, 2002). It is a significant predictor of citizens’ satisfaction with and confidence in police (Cao & Zhao, 2005). Trust in police is often studied using proxies such as confidence, satisfaction, or attitudes (Lee et al., 2015). Goldsmith (2003) argued that citizens’ perceptions of trust in police is associated with police’s ability to protect the communities they serve. Police trustworthiness is imperative to investigating the complexity of the relationship between citizens and police.

**Predictors of police trustworthiness.**

Similar to police legitimacy, police trustworthiness relies heavily on the procedural justice model. When police are seen as more respectful and showing less bias, citizens report higher levels of trust (Hough, 2012). Additionally, when police are seen as effective (Nix et al., 2015) and have adequately assisted them (Lee et al., 2015), citizens have more trust in the police. This sentiment is reflected in a study done by Tankebe (2009), where procedural fairness had a positive relationship with police trust such that when individuals perceived police officers as behaving in a procedurally just way, their trust in police increased. Another strong predictor of police trustworthiness is police performance. Sargeant et al., (2014) found that when police perform well during interactions with citizens, it promotes police trustworthiness. Similarly, when individuals were placed into an experimental condition that reflected a favorable interaction, they reported higher scores of police trustworthiness than those that did not get a favorable interaction (Murphy et al., 2013).

**Citizens’ perceptions of police trustworthiness**
Similar to procedural justice and police legitimacy, when citizens trust police more, they are more likely to cooperate and properly engage with police officers (Pickett & Nix, 2019). Citizens will also believe that the police are effective (Yesberg et al., 2023), and feel that their actions are more justified (Kyprianides et al., 2021). Trust in police relies heavily on police and citizen interactions; it is performance based (Sargeant et al., 2014). When citizens experience negative interactions with police, their trust in police is reduced (Bradford, 2010). Conversely, if police performance was believed to be poor, individuals were less likely to trust police (Silva et al., 2022). As mentioned previously, citizens can generate opinions of police based on direct and vicarious experiences (Rosenbaum et al., 2005). This concept is reiterated for police trust. Research done following the French Riots of 2017, based around police brutalizing a young Black boy, showed that the event decreased trust in police (Nagel & Lutter, 2023).

Trust in police is often linked to citizen demographics, such as race/ethnicity, socioeconomic status, or the presence of a disability (Luo et al., 2021). Police trust is often generational for ethno-racial minorities. When minority parents have “the talk” about police with their children, they are less likely to portray trust of police and less likely to relay a positive image for police than White parents (April et al., 2023). Black people portray lower levels of trust with police when compared to their White counterparts (Kim et al., 2019). This finding was replicated by Silva et al., (2022), who found that Black and Latinx individuals reported less trust in police than their White counterparts. LGBTQ+ individuals also report lower levels of trust with police than heterosexual people (Miles-Johnson, 2012). These differences in perceptions of police trust are tied with the role police play in the oppression of minority individuals. Procedural justice, police trustworthiness, and police legitimacy work within the same system.

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that determines the relationship between citizens and police. Therefore, exploring their relationship is important when determining ways to improve police and citizen relationships.

**Current investigation**

The procedural justice model posits that when police treat citizens fairly, are neutral, and treat citizens with respect, citizens have more positive perceptions of the police (Bottoms & Tankebe, 2012; Madon & Murphy, 2021). Additionally, citizens who are treated procedurally just are also more willing to cooperate with police, obey the officer, and report higher levels of trust in the police (Solomon, 2019). Although police officers have an expectation of being procedurally just, the characteristics associated with police officers may not align with this concept. To be considered procedurally just, police officers must be seen as *fair, respectful, absent of bias,* and *courteous* (Tyler 2017; Tyler & Blader, 2000). However, core characteristics of police culture and agencies may not align with the characteristics that lead citizens to have positive perceptions of police. More specifically, certain aspects of police officers learned during the academy, or throughout their tenure as a police officer, may not be consistent with characteristics citizens link to positive perceptions of police officers.

There is extensive literature regarding how police officers view themselves and the culture(s) they operate within on a daily basis (Paoline, 2003; Paoline, 2004; Paoline & Gau, 2018; Triola & Chanin, 2023). However, the link between police culture, including but not limited to procedurally just characteristics, and citizens’ perceptions of police has not been explored. These proposed studies will explore characteristics of police culture, procedural justice, police officer characteristics, and circumstances that influence citizens’ perceptions of police. The hypotheses are described below and the following chapters will discuss how the proposed studies will be carried out.
**Study One.** The first study questions how police officer occupational characteristics affect citizens’ perceptions of police legitimacy and trustworthiness. Certain characteristics of police culture come together to make conceptually different police identities (Paoline, 2004). How these characteristics manifest in police officer attitudes can affect how citizens perceive police officers and police agencies. Given that, I hypothesize the following:

*Hypothesis 1:* In a model containing positivity ratings of police officer characteristics, it is hypothesized that participants that receive the condition exhibiting the professional police officer will have higher levels of police legitimacy and police trustworthiness than those in the conditions exhibiting tough-cop and avoider police officers. This relationship will be moderated by citizens’ ratings of personal and vicarious experiences, such that those with more positive prior experiences will positively affect the relationship between the assigned condition and police legitimacy and police trustworthiness.

The accompanying model in Figure 1, outlines these hypotheses.

**Study Two.** The second study utilizes police race, procedurally just treatment, and discretionary outcomes to determine if these solutions proposed by reformists affect citizens’ perceptions of police legitimacy. Research has shown that a culmination of police officer characteristics (Pickett et al., 2023), treatment (Maguire et al., 2017), and outcome (Tyler & Huo, 2002) affects how citizens perceive police officers and citizen-police interactions. These perceptions are important in fostering prosperous relationships between the two. Given that, my hypotheses are as follows:

*Hypothesis 2:* Participants that receive vignettes of White officers will have lower police legitimacy and police trustworthiness perceptions than those that receive Black and Latinx officers.
Hypothesis 3: Participants that receive vignettes of procedurally just treatment will have higher police legitimacy and police trustworthiness perceptions than those that receive vignettes of procedurally unjust treatment.

Hypothesis 4: Participants that receive vignettes with negative discretionary outcomes will have lower police legitimacy and lower police trustworthiness perceptions than those that received positive discretionary outcomes.

Hypothesis 5: There will be an interaction between procedurally just treatment and discretionary outcome, such that when participants view an interaction with procedurally just treatment, the disparity in judgments of police legitimacy and police trustworthiness will be equal between those with positive discretionary outcomes and those with negative discretionary outcomes. For those that received procedurally unjust treatment, judgments of police legitimacy and police trustworthiness will be higher those that received positive discretionary outcomes than those that received negative discretionary outcomes.

Hypothesis 6: There will be an interaction between officer race and procedurally just treatment, such that when participants view an interaction with procedurally unjust treatment, the judgments of police legitimacy and police trustworthiness will be higher for those that receive a Black or Latinx officer than those that receive a White officer. When participants view an interaction with procedurally just treatment, there will be no such differences in judgments of police legitimacy and police trustworthiness for those that received a Black and Latinx officer and those that received a White officer.

Hypothesis 7: There will be an interaction between officer race and discretionary outcome, such that when participants view an interaction with a negative discretionary outcome, the judgments of police legitimacy and police trustworthiness will be higher for those that receive a Black or
Latinx officer than those that receive a White officer. When participants view an interaction with a positive discretionary outcome, there will be no such differences in judgments of police legitimacy and police trustworthiness for those that received a Black and Latinx officer and those that received a White officer.

The accompanying model in Figure 2 outlines these hypotheses.

**Contribution to the Literature**

Police officers are indoctrinated into a police culture that has become increasingly isolated and cynical (Brough et al., 2016; Paoline, 2003; Reiner, 2010). As a result, police officers, their behaviors, and their views on the profession, may no longer align with the concept that police officers are guardians of their community. While the bulk of empirical literature surrounding police culture focuses on how police officers view their own culture (Paoline, 2003; Paoline, 2004; Ingram et al., 2013), there is a gap in empirical literature regarding how citizens view police culture. Targeting police culture, specifically how citizens perceive police culture, can form the foundation for improvements to police agencies proposed by both the federal government and reformists. The following studies aim to identify how positively, or negatively, citizens perceive aspects of police culture and how those perceptions affect their perceptions of police legitimacy and police trustworthiness. Additionally, the goal is to determine how specific characteristics surrounding policing interactions, such as race of the officer, procedurally just treatment, and discretionary outcome, can influence citizens perceptions of police legitimacy and police trustworthiness.
Figure 1. A model of the relationship between the manipulation of police characteristics and police legitimacy and police trustworthiness. This includes the moderation of personal and vicarious police interactions and exploratory variables of social media use, political affiliation, perceptions of police, and police officer positivity ratings.
**Figure 2:** A model of the relationship between the manipulation of police race, procedurally just treatment, interaction outcome and police legitimacy and police trustworthiness. This includes the exploratory variables of social media use, political affiliation, interaction rating, and perceptions of police.
Chapter 2: Study 1

METHOD

Participants

Participants consisted of 346 individuals recruited via Prolific. Prolific is an online platform where researchers collect data and compensate participants. Participants were compensated $1.50 for their participation in the study. Participants were required to be 18 years or older, dominant English speakers, and from the continental United States. There were no other exclusion criteria. The overall sample was 56.6% female, 37.6% male, 4.4% non-binary, and 1.4% preferred not to answer; 60.7% White, 12.7% Black, 6.4% Hispanic/Latinx, 12.4% mixed race, and 7.8% preferred not to answer with an average age of 40 years old ($SD = 13.63$).

Study Design

Each participant was randomly assigned to one of three experimental conditions that highlight police officer occupational characteristics: professional, avoider, and tough cop. Following the completion of informed consent and prior to randomization into the experimental conditions described above, each participant was asked to rate the positivity of all exhibited police traits across the conditions. The order of the presentation of these ratings were counterbalanced such that characteristics of the officer types described above were never consecutively presented.

Participants were then asked to complete a questionnaire regarding their perceptions of police as a baseline. Subsequently, each participant received a small vignette detailing that police officers from around the United States were asked to describe their favorite part of their job as a part of a community building event. Afterwards, participants were shown pictures of the officers from the experimental manipulation and asked to rate how positively they viewed the officers’
descriptions of their jobs. Participants were asked a series of questions regarding their personal and vicarious experiences with police officers. Finally, they were given a counterbalanced assortment of the following measures: perceptions of police as a follow up, perceptions of police legitimacy, perceptions of police trustworthiness, and social media use.

Measures

**Demographics.** All participants were asked to complete standard demographics questions, such as race/ethnicity, gender identity, age, political affiliation, and educational level. See *Appendix A* to view the items in this measure.

**Police Officer Occupational Characteristics.** The traits of the police officers were adapted from a study regarding police culture rooted in officers’ occupational attitudes. In a study by Paoline (2004), officers reported a variety of contemporary attitudes. Those similarities and differences were grouped together in five distinct groups (e.g., clean-beat crime fighters, problem-solvers, professionals, etc.). The current study utilized three of those groups: professionals, avoiders, and tough-cops.

A professional is described as an officer that is willing to accept change and embodies broad police role orientations. An avoider is described as an officer that does the minimum for their job with neutral attitudes of policing. A tough-cop is described as an officer that is cynical, performs law enforcement aggressively, and epitomizes monolithic police culture. These groups were chosen because the categorization of their characteristics did not overlap. The characteristics outlined for these three groups were adapted for this study, such that officers within the same empirical condition received statements that were consistent with their assigned the distinct groups. An example statement of an “tough cop” is “Keeping criminals in line”. An example statement of an “avoider” is “Keeping people out of trouble.” An example statement of
a “professional” is “Connecting with my community.” See Table 1 for a list of the characteristics for each officer group used and the average positivity rating of characteristic.
**Table 1.**

*Descriptives of Police Officer Occupational Characteristics*

<table>
<thead>
<tr>
<th>Characteristics</th>
<th>M</th>
<th>SD</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professional</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. Connecting with my community.</td>
<td>5.60</td>
<td>1.58</td>
</tr>
<tr>
<td>2. Helping citizens get better outcomes.</td>
<td>5.59</td>
<td>1.59</td>
</tr>
<tr>
<td>3. Duty of responsibility to the public</td>
<td>5.50</td>
<td>1.55</td>
</tr>
<tr>
<td>4. Helping the community anyway I can.</td>
<td>5.80</td>
<td>1.49</td>
</tr>
<tr>
<td>5. Appreciating interacting with civilians.</td>
<td>5.50</td>
<td>1.54</td>
</tr>
<tr>
<td>6. Working with my supervisors.</td>
<td>4.55</td>
<td>1.32</td>
</tr>
<tr>
<td>7. Meeting people from all over.</td>
<td>5.47</td>
<td>1.42</td>
</tr>
<tr>
<td>8. Having a positive rapport with people.</td>
<td>5.62</td>
<td>1.55</td>
</tr>
<tr>
<td>9. Expanding my role with the community.</td>
<td>5.27</td>
<td>1.53</td>
</tr>
<tr>
<td>10. Working with different people.</td>
<td>5.38</td>
<td>1.36</td>
</tr>
<tr>
<td>11. Changing my department for the better.</td>
<td>5.53</td>
<td>1.43</td>
</tr>
<tr>
<td>12. Protecting the community I love.</td>
<td>5.90</td>
<td>1.49</td>
</tr>
<tr>
<td>Tough Cop</td>
<td></td>
<td></td>
</tr>
<tr>
<td>13. Maintaining law and order.</td>
<td>5.00</td>
<td>1.65</td>
</tr>
<tr>
<td>14. Catching real criminals.</td>
<td>5.29</td>
<td>1.66</td>
</tr>
<tr>
<td>15. Feeling like a crime fighter.</td>
<td>4.44</td>
<td>1.75</td>
</tr>
<tr>
<td>16. Getting to arrest criminals.</td>
<td>4.35</td>
<td>1.79</td>
</tr>
<tr>
<td>17. Attacking crime head on.</td>
<td>4.74</td>
<td>1.67</td>
</tr>
<tr>
<td>18. Maintaining public order.</td>
<td>4.83</td>
<td>1.62</td>
</tr>
<tr>
<td>19. Making daily arrests.</td>
<td>3.51</td>
<td>1.55</td>
</tr>
<tr>
<td>20. Enforcing the law.</td>
<td>4.87</td>
<td>1.52</td>
</tr>
<tr>
<td>21. Stopping big and small criminals.</td>
<td>5.14</td>
<td>1.53</td>
</tr>
<tr>
<td>22. Keeping criminals in line.</td>
<td>4.61</td>
<td>1.68</td>
</tr>
<tr>
<td>23. Doing real police work.</td>
<td>4.95</td>
<td>1.59</td>
</tr>
<tr>
<td>24. Catching violations in the act.</td>
<td>4.80</td>
<td>1.54</td>
</tr>
<tr>
<td>Avoider</td>
<td></td>
<td></td>
</tr>
<tr>
<td>25. Handling regular criminals.</td>
<td>4.26</td>
<td>1.71</td>
</tr>
<tr>
<td>26. Working with my colleagues.</td>
<td>5.18</td>
<td>1.41</td>
</tr>
<tr>
<td>27. Wearing the uniform.</td>
<td>4.46</td>
<td>1.67</td>
</tr>
<tr>
<td>28. Handling unavoidable situations.</td>
<td>4.37</td>
<td>1.60</td>
</tr>
<tr>
<td>29. Keeping people out of trouble.</td>
<td>5.06</td>
<td>1.56</td>
</tr>
<tr>
<td>30. Writing tickets and citations.</td>
<td>3.21</td>
<td>1.61</td>
</tr>
<tr>
<td></td>
<td>Rating</td>
<td>Standard Deviation</td>
</tr>
<tr>
<td>------------------------------------------</td>
<td>--------</td>
<td>--------------------</td>
</tr>
<tr>
<td><strong>31. Having a rigid work schedule.</strong></td>
<td>3.61</td>
<td>1.39</td>
</tr>
<tr>
<td><strong>32. Patrolling the neighborhoods.</strong></td>
<td>4.62</td>
<td>1.54</td>
</tr>
<tr>
<td><strong>33. Working with my partner.</strong></td>
<td>5.23</td>
<td>1.35</td>
</tr>
<tr>
<td><strong>34. Getting different experiences.</strong></td>
<td>5.24</td>
<td>1.32</td>
</tr>
<tr>
<td><strong>35. Being supported by supervisors.</strong></td>
<td>5.10</td>
<td>1.40</td>
</tr>
<tr>
<td><strong>36. Working with my department.</strong></td>
<td>4.99</td>
<td>1.34</td>
</tr>
</tbody>
</table>

*All ratings of these traits are scaled from 1 = “Extremely Negative” to 7 = “Extremely Positive”.*
**Positivity Ratings of Police Occupational Characteristics.** Participants were asked to rank the positivity of each characteristic listed from 1 = “Very Negative” to 7 = “Extremely Positive.” All characteristics were given in a randomized order, so participants would not preemptively associate a group of characteristics with a specific officer during the manipulation. The characteristics were averaged based on the predetermined groups, consistent with Paoline (2004), such that positivity ratings were given for characteristics associated with the professional, avoider, and tough-cops without the influence of other officer information as presented in the experimental stimuli. The Cronbach’s alphas are as listed: avoider, $\alpha = .86$; professional, $\alpha = .95$; tough-cop, $\alpha = .95$.

**Officer Stimuli.** A total of 12 officers were described using virtual “cards”, where each participant viewed 4 of the 12 possible virtual cards. Each participant was shown four officers of varying racial/ethnic backgrounds: Black, White, Hispanic, and Asian-American. The officers pictured have the same picture, but their characteristics changed across the three experimental conditions: professional, avoider, and tough cop. The characteristics are based upon the traits listed above. See Appendix B to view the stimuli for each condition.

**Police Officer Positivity Ratings.** Participants were also asked how they viewed each officers’ outlooks on their profession from 1 = “Very Negative” to 7 = “Extremely Positive.” ($\alpha = .96$). The four ratings of each police officer were summed across officers to create an overall composite for each participant indicating the positivity ratings of police officers that can also be used as an alternative to the use of indicator variables to denote experimental group membership in the proposed analyses. In the analyses below, this positivity rating as a covariate in a model that also contained variables to denote group membership. See Appendix C to view the questions.
Personal and Vicarious Police Interactions. Instances of personal and vicarious police interactions was measured using a series of questions asking the participant about their personal contact with the police, and that of close friends, family, and in their community (Tankebe, 2010) ($\alpha = .75$). An example item is “In the last 5 years, have you personally, had contact with the police?” These questions were either “Yes” or “No”. All participants that answer “No” had no further follow-up questions to answer for this particular item.

All participants that answered “Yes” to either having personal or vicarious contact with the police was asked three questions about their interaction. (1) Think of your last encounter with the police. How would you rate that experience? This question was rated from “1 = completely dissatisfied” to “7 = completely satisfied.” (2) Was the contact with the police-initiated by the police “e.g., traffic stop” or self-initiated “e.g., reported a crime”? (3) How would you rate the outcome of the interaction with the police? This question was rated from “1 = extremely negatively” to “7 = extremely positively.” Item scores for the first and third item were averaged. Higher scores indicate more positive interactions with the police. See Appendix F to view the items in this measure.

Perceptions of Police Legitimacy. Police legitimacy was measured using a police legitimacy scale (Tankebe, et al., 2016) ($\alpha = .96$). The police legitimacy scale is a 16-item scale that consists of 4 facets: lawfulness, procedural fairness, distributive fairness, and police effectiveness. A sample item is “When the police deal with people, they always behave according to the law”. Each question is measured on a Likert-scale from “1 = Strongly disagree” to “4 = Strongly agree”. Item scores are averaged to create a scale score and this scale was coded so that higher scores indicated higher levels of police legitimacy. For this study, an aggregate of
all subscales was used to measure police legitimacy. See Appendix D to view the items in this measure.

**Perceptions of Police Trustworthiness.** Police trustworthiness was measured using a 6-item scale adapted from a scale developed for perceived police trustworthiness (Tankebe, 2010) (α = 0.74). A sample item is “The local police are trustworthy”. Each question is measured on a Likert-scale from “1 = Strongly disagree” to “4 = Strongly agree”. Item scores are averaged to create a scale score and this scale was coded so that higher scores indicated higher levels of police trustworthiness. See Appendix E to view the items in this measure.

**Perceptions of Police.** Perceptions of police was measured using the 12-item Perceptions of Police Scale (POPS) (Nadal & Davidoff, 2015) (α = .95). A sample item is “Police officers are friendly.” Each question is measured on a Likert-scale from “1 = Strongly disagree” to “5 = Strongly agree.” Item scores were averaged to create a scale score and this scale was coded so that higher scores indicated more favorable perceptions of police officers. This scale was issued to participants twice, once before the manipulation and one after the manipulation. Perceptions of police before the manipulation is used for all subsequent analyses. See Appendix G to view the items in this measure.

**Social Media Use.** Social media use was measured using an abridged version of the Social Media Use Integration Scale (SMIUS) (Jenkins-Guarnieri, et al., 2012) (α = .82). This is a 10-item scale that consists of two subscales: Social Integration and Emotional Connection and Integration into Social Routines. A sample item is “I feel disconnected from friends when I am not on social media.” Each question is measured on a Likert-scale from “1 = Strongly disagree” to “6 = Strongly agree”. Item scores were averaged to create a scale score and this scale was coded so that higher scores indicated higher levels of social integration and emotional
connection. See Appendix H to view the items in this measure. A summary of all measures administered, test score reliability estimates, range of scores is provided in Table 2.
Table 2.

*Descriptives of Included Measures, Range, Current and Original Reliability for Study 1*

<table>
<thead>
<tr>
<th>Measure</th>
<th>$M$</th>
<th>$SD$</th>
<th>Likert Scale Range</th>
<th>Current $\alpha$</th>
<th>Original $\alpha$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Police Officer Positivity Rating</td>
<td>20.09</td>
<td>5.71</td>
<td>1 Extremely negatively to 7 Extremely positively</td>
<td>.96</td>
<td>-</td>
</tr>
<tr>
<td>Perceptions of Police</td>
<td>2.97</td>
<td>0.98</td>
<td>1 Strongly disagree to 5 Strongly agree</td>
<td>.95</td>
<td>.94</td>
</tr>
<tr>
<td>Personal Experiences</td>
<td>4.68</td>
<td>1.88</td>
<td>1 Extremely negatively to 7 Extremely positively</td>
<td>.75</td>
<td>-</td>
</tr>
<tr>
<td>Vicarious Experiences</td>
<td>4.24</td>
<td>1.78</td>
<td>1 Extremely negatively to 7 Extremely positively</td>
<td>.75</td>
<td>-</td>
</tr>
<tr>
<td>Police Legitimacy</td>
<td>2.41</td>
<td>0.72</td>
<td>1 Strongly disagree to 4 Strongly agree</td>
<td>.87</td>
<td>.96</td>
</tr>
<tr>
<td>Police Trustworthiness</td>
<td>2.55</td>
<td>0.61</td>
<td>1 Strongly disagree to 4 Strongly agree</td>
<td>.74</td>
<td>.80</td>
</tr>
<tr>
<td>Social Media Use</td>
<td>2.97</td>
<td>0.98</td>
<td>1 Strongly disagree to 5 Strongly agree</td>
<td>.82</td>
<td>.91</td>
</tr>
</tbody>
</table>
Power Analysis.

The proposed power analyses involve the determination of needed sample size treating police legitimacy and police trustworthiness as separate dependent variables in a regression analysis. In this power analysis, we are trying to determine the needed sample size to detect the interaction between the assessment of prior interaction with the police and group membership (police officer occupational characteristics). If we assume that the two variables denoting group membership, prior interaction with the police and two variables denoting the interaction between group membership and prior interaction explain 30% of the variability in either dependent variable and we also assume the two variables denoting the interaction between group membership and prior interaction with the police uniquely account for 4% of added variability ($f^2 = .043$), then a sample size of 172 participants would be needed to detect this effect at alpha = .05 with power equal to .80 (Cohen et al., 2003).
Study 1

Results

Police officer positivity ratings obtained an average score of 20.09 ($SD = 5.71$). Perceptions of police obtained an average of 2.97 ($SD = 0.98$). Ratings of personal experience with police obtained an average of 4.68 ($SD = 1.88$). Ratings of vicarious experiences with police obtained an average of 4.24 ($SD = 1.78$). Citizens’ perceptions of police legitimacy obtained an average of 2.41 ($SD = 0.72$). Citizens’ perceptions of police trustworthiness obtained an average of 2.55 ($SD = 0.61$). Social media use obtained an average of 2.84 ($SD = 0.78$). The examined variables are significantly and positively correlated with each other. These results are consistent with previous literature exploring how these variables have relationships with each other, when concerning the relationship between police and citizens (Bello & Matshaba, 2021; Bello & Steyn, 2019; Harris & Jones, 2020). The descriptive statistics and correlations of all variables are provided in Table 3.

Hypothesis 1 stated that participants that receive the condition exhibiting the professional police officer will have higher levels of police legitimacy and police trustworthiness than those in the conditions exhibiting tough-cop and avoider police officers. This relationship will be moderated by citizens’ ratings of personal and vicarious experiences, such that those with more positive prior experiences will have higher levels of citizens’ perceptions of police legitimacy and police trustworthiness than those with more negative experiences. Two linear regressions were performed to test this hypothesis, using participant condition, ratings of personal and vicarious experiences, police officer positivity ratings, and perceptions of police at the baseline as predictors of perceptions of police legitimacy and police trustworthiness.
Of the 346 participants in the study, 141 individuals reported having both personal and vicarious experiences with a police officer. The proposed model is significant in predicting perceptions of police legitimacy \( F(9,138) = 22.484, p = <.001, R^2 = .611 \). When controlling for police officer positivity ratings, the avoider police officer condition \( (B = 0.138, SE = .311, t = .443, p = .659) \) and the tough-cop condition \( (B = 0.242, SE = .319, t = 0.758, p = .450) \) did not differ from the professional officer condition in predicting perceptions of police legitimacy. In these analyses, the professional police officer condition was the referent condition.

Police officer positivity ratings predicted perceptions of police legitimacy \( (B = 0.027, SE = .010, t = 2.846, p = .005) \). Ratings of personal experiences \( (B = 0.114, SE = .086, t = 1.318, p = .190) \) did not predict perceptions of police legitimacy, but ratings of vicarious experiences \( (B = 0.223, SE = .085, t = 2.627, p = .010) \) did predict perceptions of police legitimacy. Ratings of personal experiences did not moderate the relationship between police officer condition and perceptions of police legitimacy when comparing those in the avoider condition to the professional condition \( (B = 0.012, SE = .097, t = 0.121, p = .904) \) or when comparing those in the tough-cop condition to the professional condition \( (B = 0.102, SE = .099, t = 1.024, p = .308) \). Ratings of vicarious experiences did not moderate the relationship between police officer condition and perceptions of police legitimacy when comparing those in the avoider condition to the professional condition \( (B = -0.075, SE = .098, t = -0.763, p = .447) \) or when comparing those in the tough-cop condition to the professional condition \( (B = -0.171, SE = .098, t = -1.751, p = .082) \).

The proposed model is also significant in predicting perceptions of police trustworthiness \( F(9,138) = 26.281, p = <.001, R^2 = .647 \). When controlling for police officer positivity ratings, the avoider police officer condition \( (B = 0.409, SE = .245, t = 1.671, p = .097) \) did not differ
from the professional officer condition in predicting perceptions of police trustworthiness. However, the tough-cop condition \((B = 0.544, SE = .251, t = 2.167, p = .032)\) did differ from the professional officer condition in predicting perceptions of police trustworthiness. Police officer positivity ratings predicted perceptions of police trustworthiness \((B = 0.026, SE = .008, t = 3.464, p = .001)\). Ratings of personal experiences \((B = 0.194, SE = .068, t = 2.865, p = .005)\) predicted perceptions of police trustworthiness, but ratings of vicarious experiences \((B = 0.117, SE = .067, t = 1.748, p = .083)\) did not predict perceptions of police trustworthiness.

Ratings of personal experiences did not moderate the relationship between police officer condition and perceptions of police trustworthiness when comparing those in the avoider condition to the professional condition \((B = -0.064, SE = .076, t = -0.840, p = .402)\) or when comparing those in the tough-cop condition to the professional condition \((B = -0.028, SE = .079, t = -0.350, p = .727)\). Ratings of vicarious experiences did not moderate the relationship between police officer condition and perceptions of police trustworthiness when comparing those in the avoider condition to the professional condition \((B = -0.034, SE = .077, t = -0.439, p = .662)\) or when comparing those in the tough-cop condition to the professional condition \((B = -0.085, SE = .078, t = -1.095, p = .275)\). The results of this model are provided in Table 4 below.

**Police Officer Occupational Characteristics**

The three officer groups were evaluated using the composite variables across all traits consistent with Paoline’s (2004) traits of police occupational attitudes. The positivity ratings for all twelve of the “professional” characteristics scored an average score of 5.48 \((SD = 1.21)\); 95% CI [5.35, 5.61]; the twelve “avoider” characteristics scored an average of 4.62 \((SD = .93)\); 95% CI [4.52,4.71] and the twelve “tough cop” characteristics scored an average of 4.72 \((SD = 1.28)\); 95% CI [4.58, 4.85]. Descriptives for all 36 traits are listed in Table 1.
In examining the confidence intervals, we see that the confidence interval for the “professional” does not overlap with either of the confidence intervals for the “avoider” and “tough cop” confidence intervals. Moreover, the midpoint for these ratings is 4. These confidence intervals suggest the following: (a) the “professional” traits are rated more positively than either the “tough cop” and “avoider” trait, (b) there does not appear to be a difference between “tough cop” and “avoider” traits and (c) the traits, on average, seem to be rated positively.
Table 4.  
**Conditions of Police Officer Occupational Characteristics Predicting Perceptions of Police Legitimacy and Police Trustworthiness moderated by Personal and Vicarious Experiences using Professional Police as Referent Condition for Participants with both Personal and Vicarious Experiences.**

<table>
<thead>
<tr>
<th></th>
<th>Police Legitimacy</th>
<th></th>
<th></th>
<th>Police Trustworthiness</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>SE</td>
<td>t</td>
<td>p</td>
<td>B</td>
<td>SE</td>
</tr>
<tr>
<td>Avoider Condition</td>
<td>0.138</td>
<td>.311</td>
<td>0.443</td>
<td>.659</td>
<td>0.409</td>
<td>.245</td>
</tr>
<tr>
<td>Tough Cop Condition</td>
<td>0.242</td>
<td>.319</td>
<td>0.758</td>
<td>.450</td>
<td>0.544</td>
<td>.251</td>
</tr>
<tr>
<td>Police Positivity Ratings</td>
<td>0.027</td>
<td>.010</td>
<td>2.846</td>
<td>.005</td>
<td>0.026</td>
<td>.008</td>
</tr>
<tr>
<td>Personal Experiences</td>
<td>0.114</td>
<td>.086</td>
<td>1.318</td>
<td>.190</td>
<td>0.194</td>
<td>.068</td>
</tr>
<tr>
<td>Vicarious Experiences</td>
<td>0.223</td>
<td>.085</td>
<td>2.627</td>
<td>.010</td>
<td>0.117</td>
<td>.067</td>
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</table>

**Moderation Analyses**

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<th>Police Trustworthiness</th>
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<td>SE</td>
<td>t</td>
<td>p</td>
<td>B</td>
<td>SE</td>
</tr>
<tr>
<td>Avoider Condition</td>
<td>0.012</td>
<td>.097</td>
<td>0.121</td>
<td>.904</td>
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<td>.076</td>
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<tr>
<td>Tough Cop Condition</td>
<td>0.102</td>
<td>.099</td>
<td>1.024</td>
<td>.308</td>
<td>-0.028</td>
<td>.079</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>Police Legitimacy</th>
<th></th>
<th></th>
<th>Police Trustworthiness</th>
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<tr>
<td></td>
<td>B</td>
<td>SE</td>
<td>t</td>
<td>p</td>
<td>B</td>
<td>SE</td>
</tr>
<tr>
<td>Avoider Condition</td>
<td>-0.075</td>
<td>.095</td>
<td>-0.763</td>
<td>.447</td>
<td>-0.034</td>
<td>.077</td>
</tr>
<tr>
<td>Tough Cop Condition</td>
<td>-0.171</td>
<td>.098</td>
<td>-1.751</td>
<td>.082</td>
<td>-0.085</td>
<td>.078</td>
</tr>
</tbody>
</table>
Exploratory Analyses

In the regression analyses reported above, perceptions of police was also added to a model containing avoider condition, tough cop condition, police officer positivity ratings, ratings of personal experiences and vicarious experiences and the two interaction terms. Perceptions of police is positively associated with police legitimacy ($B = 0.637, SE = .043, t = 14.686, p < .001$). Perceptions of police is also positively associated with police trustworthiness ($B = 0.424, SE = .042, t = 10.036, p < .001$).

Perceptions of police was added to the hypothesized model. When controlling for perceptions of police when predicting police legitimacy, $R^2$ increases to 85.4%. This is a 24.3% additional variance explained in the model, when controlling for perceptions of police in the model predicting police legitimacy. When controlling for perceptions of police, all of the previous effects disappeared: avoider condition ($B = 0.178, SE = .189, t = 0.940, p = .349$), tough-cop condition ($B = -0.017, SE = .197, t = -0.086, p = .932$), police officer positivity ratings ($B = 0.001, SE = .006, t = 0.130, p = .897$), ratings of personal experiences ($B = 0.054, SE = .053, t = 1.025, p = .307$), and ratings of vicarious experiences ($B = 0.007, SE = .054, t = 0.123, p = .902$).

When controlling for perceptions of police when predicting police trustworthiness, $R^2$ increases to 80.1%. This is a 24.3% additional variance explained in the model, when controlling for perceptions of police in the model predicting perceptions of police trustworthiness. When controlling for perceptions of police, the avoider condition began to significantly predict police trustworthiness ($B = 0.439, SE = .184, t = 2.387, p = .018$). However previous effects disappeared for the tough cop condition ($B = .352, SE = .191, t = 1.839, p = .068$) and police officer positivity ratings ($B = .009, SE = .006, t = 1.528, p = .129$). The effects stayed the same
for ratings of personal experiences (B = .154, SE = .051, t = 3.017, p = .003) and ratings of vicarious experiences (B = -0.027, SE = .052, t = -0.526, p = .600).

In all prior analyses, police officer positivity ratings were used as a predictor of police legitimacy and police trustworthiness alongside the participant conditions. This analysis looks at how police officer positivity ratings differed based upon participant condition for the overall sample. To explore this, a linear regression was conducted. Individuals in the avoider police officer condition (B = -3.986, SE = .709, t = -5.620, p < .001) and the tough cop condition (B = -5.367, SE = .711, t = -7.550, p < .001) had lower police officer positivity ratings than those in the professional police officer condition.

Since not all the participants reported having both vicarious and personal experiences with police, analyses were conducted to compare samples of those that: (a) no experiences with the police (n = 81), (b) have only personal experiences with police (n = 55), and (c) have only vicarious experiences with police (n = 47). All correlations and descriptives for each group are in Table 5, Table 6, and Table 7, respectfully.

*Individuals with no experience with police*

For individuals with no experience with the police, the avoider police officer condition (B = 0.218, SE = .173, t = 1.257, p = .212) and the tough cop condition (B = .326, SE = .178, t = 1.831, p = .071) did not differ from the professional police officer condition in predicting perceptions of police legitimacy. Police officer positivity ratings significantly predicted perceptions of police legitimacy (B = 0.060, SE = .014, t = 4.302, p < .001). The avoider police officer condition (B = 0.053, SE = .162, t = 0.325, p = .746) and the tough cop condition (B = 0.281, SE = .167, t = 1.688, p = .095) did not differ from the professional police officer condition.
in predicting perceptions of police trustworthiness. Police officer positivity ratings significantly predicted perceptions of police trustworthiness (B = 0.041, \( SE = .013, t = 3.144, p = .002 \)).

**Individuals with only personal experience with police**

For individuals that have only personal experiences, the avoider police officer condition did not differ from the professional police officer condition in predicting perceptions of police legitimacy (B = 0.690, \( SE = .488, t = 1.414, p = .164 \)). The tough cop condition did differ from the professional police officer condition in predicting perceptions of police legitimacy (B = 1.139, \( SE = .404, t = 2.822, p = .007 \)). Police officer positivity ratings significantly predict perceptions of police legitimacy (B = 0.264, \( SE = .058, t = 4.794, p < .001 \)). Ratings of personal experiences significantly predict perceptions of police legitimacy (B = 0.264, \( SE = .058, t = 4.558, p < .001 \)).

Personal experience did not moderate the relationship between perceptions of police legitimacy and the avoider police officer condition as it compares to the professional police officer condition (B = -0.070, \( SE = .093, t = -0.751, p = .456 \)). Personal experience did moderate the relationship between perceptions of police legitimacy and the tough cop condition as it compares to the professional police officer condition (B = -0.166, \( SE = .076, t = -2.168, p = .035 \)). However, when personal experience and experimental condition interaction into the model, the \( R^2 \) change = .032, but it is not statistically significant \( F(2, 49) = 2.394, p = .102 \). The avoider police officer condition (B = 0.148, \( SE = .454, t = 0.327, p = .745 \)) and the tough cop condition (B = 0.332, \( SE = .376, t = 0.885, p = .381 \)) did not differ from the professional police officer condition in predicting perceptions of police trustworthiness.

Police officer positivity ratings significantly predict perceptions of police trustworthiness (B = 0.037, \( SE = .014, t = 2.592, p = .013 \)). Ratings of personal experiences significantly predict
perceptions of police trustworthiness (B = 0.174, SE = .054, t = 3.233, p = .002). Ratings of personal experience did not moderate the relationship between perceptions of police trustworthiness and the avoider police officer condition (B = -0.014, SE = .087, t = -0.166, p = .869) or the tough cop condition (B = -0.052, SE = .087, t = -0.166, p = .466) as they compare to the professional police officer condition.

*Individuals with only vicarious experience with police*

For individuals that have only vicarious experiences, the avoider police officer condition (B = -0.288, SE = .486, t = -0.593, p = .557) and the tough cop condition (B = .754, SE = .460, t = 1.638, p = .109) did not differ from the professional police officer condition in predicting perceptions of police legitimacy. Police officer positivity ratings significantly predict perceptions of police legitimacy (B = 0.034, SE = .015, t = 2.225, p = .032). Ratings of vicarious experiences significantly predict perceptions of police legitimacy (B = 0.170, SE = .058, t = 2.911, p = .006).

Ratings of vicarious experiences did not moderate the relationship between perceptions of police legitimacy and the avoider police officer condition (B = 0.071, SE = .118, t = 0.600, p = .552) or the tough cop condition (B = -0.084, SE = .111, t = -0.757, p = .454) as they compare to the professional police officer condition. The avoider police officer condition (B = -0.558, SE = .402, t = -1.390, p = .172) and the tough cop condition (B = 0.334, SE = .380, t = 0.879, p = .385) did not differ from the professional police officer condition in predicting perceptions of police trustworthiness. Police officer positivity ratings significantly predict perceptions of police trustworthiness (B = 0.041, SE = .013, t = 3.157, p = .003). Ratings of vicarious experiences significantly predict perceptions of police trustworthiness (B = .179, SE = .048, t = 3.705, p = .001). Ratings of vicarious experiences did not moderate the relationship between perceptions of police trustworthiness and the avoider police officer condition (B = 0.143, SE = .098, t = 1.458, p
= .153) or the tough cop condition (B = -0.042, SE = .092, t = -0.453, p = .653) as they compare to the professional police officer condition.

**Study 1 Conclusions**

The hypothesis for this study stated that participants that receive the condition exhibiting the professional police officer will have higher levels of police legitimacy and police trustworthiness than those in the conditions exhibiting tough-cop and avoider police officers. This relationship will be moderated by citizens’ ratings of personal and vicarious experiences, such that those with more positive prior experiences will have higher levels of citizens’ perceptions of police legitimacy and police trustworthiness than those with more negative experiences. The results of this study did not support that hypothesis.

Participants in the tough cop condition had higher perceptions of police trustworthiness than those in the professional police officer condition. Ratings of personal and vicarious experiences did not moderate the relationship between participant condition and perceptions of police legitimacy and police trustworthiness. The more positive participants rated their vicarious experiences, the higher their perceptions of police legitimacy. The more positive participants rated their personal experiences, the higher their perceptions of police trustworthiness. This is consistent with existing literature that suggests that personal and vicarious experiences is related to perceptions of police (Pryce et al., 2021; Rosenbaum et al., 2005). This study concludes that individuals are using both their personal experiences and vicarious experiences to inform their relationship with police, specifically influencing their perceptions of police legitimacy and police trustworthiness.

Additionally, the higher the police officer positivity ratings, the higher perceptions of police legitimacy and police trustworthiness. While police researchers have looked at police
officers entirely, their characteristics and how positively those characteristics are rated have not been explored. Research has shown that police officer occupational attitudes exist in several distinct groups, such as the crime-fighter or the problem solver (Paoline, 2003; 2004). These attitudes affect how officers behave on the job (Paoline & Terrill, 2005; Terrill et al., 2003; Terrill & Paoline, 2015). This result provides a unique contribution to the existing literature.

Previous literature regarding police culture in this manner has not explored how police culture, specifically police occupational attitudes, can affect how citizens perceive aspects of police agencies.

It was also found that perceptions of police significantly affect perceptions of police legitimacy and police trustworthiness. In all the exploratory analyses, perceptions of police is a driving factor influencing citizens’ perceptions of police legitimacy and police trustworthiness. Much of literature exploring perceptions of police utilizes this measure as an outcome variable, often looking at how a myriad of predictors, such as procedural justice (Johnson et al., 2017), sexual orientation (Owen et al., 2018) and race (Taylor et al., 2020). However, perceptions of police has not be studied as a predictor of police legitimacy and police trustworthiness. This study found provides that empirical contribution. When perceptions of police are included in our models, it practically and significantly explains added variability and the unique contributions of the other predictor variables are no longer statistically significant. This shows that perceptions of police are a driving factor in predicting perceptions of police legitimacy and police trustworthiness. Research should use this variable as a predictor in future empirical works.
Chapter 3: Study 2

METHOD

Participants

Participants consisted of 313 individuals recruited via Prolific. Prolific is an online platform where researchers collect data and compensate participants. Participants were compensated $1.50 for their participation in the study. Participants were required to be 18 years or older, dominant English speakers, and from the continental United States. There were no other exclusion criteria. The overall sample was 55.6% female, 40.6% male, 2.5% non-binary and 1.3% preferred not to answer; 64.5% White, 8.6% Black, 5.4% Hispanic/Latinx, 8.9% Asian, 5.9% mixed race, and 6.7% preferred not to answer with an average age of 41 years old (SD = 13.38).

Study Design.

The current study is a 3 (Race: Black officer, White officer, Latinx officer) x 2 (Procedurally Just Treatment: Just, Unjust) x 2 (Interaction Outcome: Negative, Positive) between-subjects design. Participants received a demographics questionnaire and then a measure of their perceptions of police at baseline. Then each participant was randomly assigned to one of 12 conditions, where each participant received a vignette outlining a traffic stop of an individual. The vignette had content depending upon participant condition. The person interacting in the vignette had no identifiable gender or race assigned to them. See Appendix I to view a sample of the vignette, adapted from Williamson et al. (2023). Afterwards, the participants gave a general rating of their interaction, complete the manipulation check, and counterbalanced order of the following measures: perceptions of police as a follow up, perceptions of police legitimacy, perceptions of police trustworthiness, and social media use. All measures following the
manipulation check were counterbalanced, where each participant will receive a different order of the measures.

**Measures**

*Demographics.* All participants were asked standard demographics questions, such as race/ethnicity, gender identity, age, political affiliation, and educational level.

*Perceptions of Police.* Perceptions of police was measured using the 12-item Perceptions of Police Scale (POPS) (Nadal & Davidoff, 2015) \((\alpha = .96)\). A sample item is “Police officers are friendly.” Each question is measured on a Likert-scale from “1 = Strongly disagree” to “5 = Strongly agree.” Item scores were averaged to create a scale score and this scale was coded so that higher scores indicated more favorable perceptions of police officers. This scale was issued to participants twice, once before the manipulation and one after the manipulation. See Appendix G to view the items in this measure.

*Manipulation check.* Each participant was asked where they interacted with the police officer. It was a question asking the race of the police officer in the vignette. Thirteen participants that failed the manipulation check were removed from the final data analysis. See Appendix J to view these questions.

*Interaction Rating.* Following the presentation of the vignette, participants were asked to rate the police interaction \((\alpha = .95)\). They rated their satisfaction with the officer, the treatment of the individual in the vignette, and the overall citizen-police interaction from “1 = very dissatisfied” to “5 = very satisfied.” See Appendix K to view these questions.

*Police Legitimacy.* Police legitimacy was measured using a police legitimacy scale (Tankebe, et al., 2016) \((\alpha = .95)\), as before the police legitimacy scale is a 16-item scale that consists of 4 facets: lawfulness, procedural fairness, distributive fairness, and police
effectiveness. A sample item is “When the police deal with people, they always behave according to the law”. Each question is measured on a Likert-scale from “1 = Strongly disagree” to “7 = Strongly agree”. Item scores were averaged to create a scale score and this scale was coded so that higher scores indicated higher levels of police legitimacy. For this study, an aggregate of all subscales will be used to measure police legitimacy. See Appendix D to view the items in this measure.

**Police Trustworthiness.** Police trustworthiness was measured using a 6-item scale adapted from a scale developed for perceived police trustworthiness (Tankebe, 2010) (α = .74). A sample item is “The local police are trustworthy”. Each question is measured on a Likert-scale from “1 = Strongly disagree” to “4 = Strongly agree”. Item scores are averaged to create a scale score and this scale was coded so that higher scores indicated higher levels of police trustworthiness. See Appendix E to view the items in this measure.

**Social Media Use.** Social media use was measured using an abridged version of the Social Media Use Integration Scale (SMIUS) (Jenkins-Guarnieri, et al., 2012) (α = .81). This is a 10-item scale that consists of two subscales: Social Integration and Emotional Connection and Integration into Social Routines. A sample item is “I feel disconnected from friends when I am not on social media.” Each question is measured on a Likert-scale from “1 = Strongly disagree” to “6 = Strongly agree”. Item scores were averaged to create a scale score and this scale was coded so that higher scores indicated higher levels of social integration and emotional connection. See Appendix H to view the items in this measure. A summary of all measures administered, test score reliability estimates, range of scores is provided in Table 8.
Table 8.

Descriptives of Included Measures, Range, Current and Original Reliability for Study 2

<table>
<thead>
<tr>
<th>Measure</th>
<th>M</th>
<th>SD</th>
<th>Likert Scale Range</th>
<th>Current α</th>
<th>Original α</th>
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<tr>
<td>Perceptions of Police at Baseline</td>
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<td>1 Strongly disagree to 5 Strongly agree</td>
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<td>.94</td>
</tr>
<tr>
<td>Interaction Rating</td>
<td>2.69</td>
<td>1.40</td>
<td>1 Totally disagree to 5 Totally agree</td>
<td>.95</td>
<td>-</td>
</tr>
<tr>
<td>Perceptions of Police at Follow Up</td>
<td>2.91</td>
<td>1.00</td>
<td>1 Strongly disagree to 5 Strongly agree</td>
<td>.96</td>
<td>.94</td>
</tr>
<tr>
<td>Police Legitimacy</td>
<td>2.32</td>
<td>0.67</td>
<td>1 Strongly disagree to 4 Strongly agree</td>
<td>.95</td>
<td>.96</td>
</tr>
<tr>
<td>Police Trustworthiness</td>
<td>2.55</td>
<td>0.83</td>
<td>1 Strongly disagree to 4 Strongly agree</td>
<td>.74</td>
<td>.80</td>
</tr>
<tr>
<td>Social Media Use</td>
<td>2.84</td>
<td>0.90</td>
<td>1 Strongly disagree to 5 Strongly agree</td>
<td>.81</td>
<td>.91</td>
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</table>
Power Analysis

Using the framework to determine sample size as outlined by Cohen et al., (2003), we treated the proposed design as a regression model, where unweighted effects coded variables would be created so that two effect-coded variables represented officer race, one effect-coded variable represented procedurally just treatment (just or unjust) and one effect-coded variable represented the discretionary outcome (positive or negative). For this power analysis, it was of interest to determine sample size to detect the three hypothesized two-way interactions (procedural justice X outcome; procedural justice X office race; officer race X outcome). Assuming the effect-coded variables representing all main effects, all two-ways interaction and the three-way interaction accounted for 15% of variability in each outcome variable and the two-way interactions uniquely accounted for 4% of explained variability in each outcome variable, then it was determined that 279 participants would be needed to detect these two-way interactions at alpha equal to 0.05 and power = 0.80. If the 279 participants are evenly distributed across experimental condition, then 23.25 participants would be in each experimental condition. We decided to round the needed sample size to 300, so that we should have 25 participants in each of the 12 possible experimental conditions.
Study 2

Results

Perceptions of police at the baseline obtained an average of 2.95 (SD = 0.99). Interaction ratings obtained an average of 2.69 (SD = 1.40). Perceptions of police at the follow-up obtained an average of 2.91 (SD = 1.00). Citizens’ perceptions of police legitimacy obtained an average of 2.32 (SD = 0.67). Citizens’ perceptions of police trustworthiness obtained an average of 2.55 (SD = 0.83). Social media use obtained an average of 2.84 (SD = 0.90). The examined variables, with the exception of social media use, are significantly positively correlated with each other. These results are consistent with previous literature exploring how these variables have relationships with each other, when concerning the relationship between police and citizens (Bello, 2021; Bello & Styn, 2019; Harris & Jones, 2020). The descriptive statistics and correlations of all variables are provided in Table 9.

Hypothesis 1 stated that participants that viewed vignettes of White police officers will have lower perceptions of police legitimacy and police trustworthiness than those that receive Black and Latinx police officers. The results of the multivariate analysis of variance (MANOVA) did not support this hypothesis. There were no differences in perceptions of police legitimacy Multivariate $F(2,312) = 1.009, p = .366$, partial $\eta^2 = .007$ (Black Officer: $M = 2.25, SD = 0.66$; White Officer: $M = 2.34, SD = 0.65$; Latinx Officer: $M = 2.38, SD = 0.70$) or perceptions of police trustworthiness Multivariate $F(2, 312) = 0.215, p = .807$, partial $\eta^2 = .007$ (Black Officer: $M = 2.52, SD = 0.86$; White Officer: $M = 2.59, SD = 0.81$; Latinx Officer: $M = 2.55, SD = 0.84$) based on the race of the police officer.

Hypothesis 2 stated that participants that viewed vignettes reflecting procedurally just treatment will have higher perceptions of police legitimacy and police trustworthiness than those
that viewed procedurally unjust treatment. The results of the MANOVA did not support this hypothesis. There were no differences in perceptions of police legitimacy $Multivariate F(1,312) = 2.928, p = .088$, partial $\eta^2 = .010$ (Procedurally just treatment: $M = 2.39, SD = 0.69$; Procedurally unjust treatment: $M = 2.26, SD = 0.64$) or perceptions of police trustworthiness $Multivariate F(1,312) = 2.923, p = .088$, partial $\eta^2 = .010$ (Procedurally just treatment: $M = 2.63, SD = 0.86$; Procedurally unjust treatment: $M = 2.47, SD = 0.81$) based on procedurally just treatment.

Hypothesis 3 stated that participants that viewed vignettes with negative discretionary outcomes will have lower perceptions of police legitimacy and police trustworthiness than those that viewed positive discretionary outcomes. The results of the MANOVA did not support this hypothesis. There were no differences in perceptions of police legitimacy $Multivariate F(1,312) = 0.275, p = .600$, partial $\eta^2 = .001$ (Positive outcome: $M = 2.34, SD = 0.66$; Negative outcome: $M = 2.30, SD = 0.68$) or perceptions of police trustworthiness $Multivariate F(1,312) = 1.405, p = .237$, partial $\eta^2 = .005$ (Positive outcome: $M = 2.61, SD = 0.83$; Negative outcome: $M = 2.49, SD = 0.84$) based on procedurally just treatment.

There were also a series of proposed interactions that are outlined below. Hypothesis 4 stated that there will be an interaction between procedurally just treatment and discretionary outcome, such that when participants view an interaction of procedurally just treatment, there will be no differences in perceptions of police legitimacy and police trustworthiness between positive discretionary outcomes and negative discretionary outcomes. For those that received procedurally unjust treatment, judgments of police legitimacy and police trustworthiness will be higher those that received positive discretionary outcomes than those that received negative discretionary outcomes.
The results of a MANOVA did not support this hypothesis. For participants in the procedurally just condition, there was no difference in perceptions of police legitimacy
Multivariate $F(1, 154) = 1.633, p = .203$, partial $\eta^2 = .011$ (Positive outcome $M = 2.46, SD = 0.64$; Negative outcome $M = 2.32, SD = 0.74$) or perceptions of police trustworthiness
Multivariate $F(1, 154) = 2.921, p = .089$, partial $\eta^2 = .089$ (Positive outcome $M = 2.75, SD = 0.83$; Negative outcome $M = 2.52, SD = 0.87$) based on discretionary outcome. For participants in the procedurally unjust condition, there was also no difference in perceptions of police legitimacy $Multivariate F(1, 157) = 0.350, p = .555$, partial $\eta^2 = .002$ (Positive outcome $M = 2.22, SD = 0.66$; Negative outcome $M = 2.23, SD = 0.63$) or perceptions of police trustworthiness $Multivariate F(1, 157) = 0.001, p = .974$, partial $\eta^2 = .974$ (Positive outcome $M = 2.47, SD = 0.81$; Negative outcome $M = 2.47, SD = 0.81$) based on discretionary outcome.

Hypothesis 5 stated that there will be an interaction between police officer race and procedurally just treatment, such that when participants view an interaction with a police officer exhibiting procedurally unjust treatment, the perceptions of police legitimacy and police trustworthiness will be higher for those that receive Black and Latinx officer than those that receive a White officer. Additionally, when participants view an interaction with a police officer exhibiting procedurally just treatment, there will be no such differences in perceptions of police legitimacy and police trustworthiness for those that viewed a Black and Latinx officer and those that viewed a White officer.

The results of a MANOVA did not support this hypothesis. For participants in the procedurally just condition, there was no difference in perceptions of police legitimacy
Multivariate $F(2, 154) = 0.153, p = .859$, partial $\eta^2 = .002$ (Black officer: $M = 2.36, SD = 0.69$; White officer: $M = 2.38, SD = 0.65$; Latinx officer: $M = 2.43, SD = 0.74$) or perceptions of police
trustworthiness. Multivariate $F(2, 154) = 0.192, p = .826$, partial $\eta^2 = .003$ (Black officer: $M = 2.60, SD = 0.90$; White officer: $M = 2.69, SD = 0.80$; Latinx officer: $M = 2.60, SD = 0.88$) based on police officer race. For participants in the procedurally unjust condition, there was no difference in perceptions of police legitimacy Multivariate $F(2, 157) = 1.340, p = .265$, partial $\eta^2 = .017$ (Black officer: $M = 2.14, SD = 0.59$; White officer: $M = 2.31, SD = 0.66$; Latinx officer: $M = 2.33, SD = 0.67$) or perceptions of police trustworthiness Multivariate $F(2, 157) = 0.089, p = .915$, partial $\eta^2 = .001$ (Black officer: $M = 2.44, SD = 0.81$; White officer: $M = 2.49, SD = 0.82$; Latinx officer: $M = 2.49, SD = 0.81$) based on police officer race.

Hypothesis 6 stated that there will be an interaction between officer race and discretionary outcome, such that when participants viewed an interaction with a negative discretionary outcome, the perceptions of police legitimacy and police trustworthiness will be higher for those that receive a Black or Latinx officer than those that receive a White officer. Additionally, when participants viewed an interaction with a positive discretionary outcome, there will be no such differences in perceptions of police legitimacy and police trustworthiness based on police officer race.

The results of a MANOVA did not support this hypothesis. For participants in the positive discretionary outcome condition, there was no difference in perceptions of police legitimacy Multivariate $F(2, 155) = 0.498, p = .609$, partial $\eta^2 = .006$ (Black officer: $M = 2.36, SD = 0.62$; White officer: $M = 2.39, SD = 0.69$; Latinx officer: $M = 2.37, SD = 0.67$) or perceptions of police trustworthiness. Multivariate $F(2, 156) = 0.475, p = .623$, partial $\eta^2 = .006$ (Black officer: $M = 2.67, SD = 0.85$; White officer: $M = 2.64, SD = 0.83$; Latinx officer: $M = 2.52, SD = 0.81$) based on police officer race. For participants in the negative discretionary outcome condition, there was no difference in perceptions of police legitimacy Multivariate $F(2,
$156) = 0.726, p = .485$, partial $\eta^2 = .009$ (Black officer: $M = 2.23, SD = 0.69$; White officer: $M = 2.29, SD = 0.62$; Latinx officer: $M = 2.39, SD = 0.74$) or perceptions of police trustworthiness $Multivariate F(2, 156) = 0.917, p = .402$, partial $\eta^2 = .012$ (Black officer: $M = 2.37, SD = 0.85$; White officer: $M = 2.55, SD = 0.80$; Latinx officer: $M = 2.57, SD = 0.86$) based on police officer race.

**Exploratory Analysis**

As an exploratory analysis, a measured variable path analysis was conducted with perceptions of police at follow-up, perceptions of police legitimacy, perceptions of police trustworthiness and the participant ratings of the police-citizen interaction as outcome variables. Predictor variables included perceptions of police at baseline, effect coded variables denoted the effect of African American officer race and Latinx officer ethnicity from the grand mean, an effect coded variable denoting the effect of procedurally just treatment, an effect coded variable denoting the effect of a favorable discretionary outcome, interactions involving perceptions of police at baseline and procedurally just treatment as well as an interaction involving perceptions of police at baseline and the favorability of the discretionary outcome. Also included in the model were interactions involving African American officer race and being procedurally just treatment and Latinx officer ethnicity and procedurally just treatment.

In this model, the residual variances among the outcome variables were allowed to be correlated, resulting in a saturated model (a model with 0 degrees of freedom) which resulted in a perfect fitting model. **MPlus** version 8.6 (Muthén and Muthén, 1997 -2024) was used to conduct these analyses and the MLR estimator to address data non-normality.

Results for each dependent measure are discussed below. Unstandardized partial regression coefficients are reported below, as an interaction was detected. In these analyses,
continuous variables were mean-centered to aid in the interpretability of an interaction involving a continuous variable (Morera et al., 2023).

**Perceptions of police at follow-up**

Statistical predictors of perceptions of police at follow-up included the following: (a) Perceptions of police at baseline ($B = 0.977$, $SE = 0.016$, $t = 60.537$, $p < .001$), (b) Latinx officer race ($B = -0.044$, $SE = 0.022$, $t = -2.013$, $p = .044$), (c) being treated procedurally just ($B = 0.089$, $SE = 0.015$, $t = 6.091$, $p < .001$), (d) having a favorable discretionary outcome ($B = -0.029$, $SE = 0.014$, $t = -2.012$, $p = .044$), (e) the interaction involving African American officer race and procedurally just treatment ($B = 0.054$, $SE = 0.022$, $t = 2.511$, $p = .012$), (f) the interaction involving Latinx officer ethnicity and procedurally just treatment ($B = -0.042$, $SE = 0.021$, $t = -1.978$, $p = .048$). The path analysis results are displayed in Figure 3.

**Interaction Rating**

Statistical predictors of trust in police included the following: (a) Perceptions of police at baseline ($B = 0.423$, $SE = 0.046$, $t = 9.214$, $p < .001$), (b) procedurally just treatment ($B = 0.970$, $SE = 0.051$, $t = 19.059$, $p < .001$), (c) the interaction involving African American officer race and being treated justly ($\beta = 0.148$, $SE = 0.067$, $t = 2.203$, $p = .028$), and (d) the interaction involving perceptions of the police at baseline and procedurally just treatment ($\beta = 0.105$, $SE = 0.047$, $t = 2.250$, $p = .024$). This interaction was probed using the Johnson-Neyman regions of significance (Johnson & Neyman, 1936). If the individual scores five points below the mean on perceptions of police at baseline or lower, there was no significant relationship between being treated justly and the interaction rating. For individuals who score more than five points above the mean on perceptions of police, the relationship between being treated justly and perceptions of the interaction was significant and positive. The path analysis results are displayed in Figure 4.
Perceptions of police legitimacy

Statistical predictors of trust in police included the following: (a) Perceptions of police at baseline ($B = 0.602$, $SE = 0.019$, $t = 32.372$, $p < .001$), (b) procedurally just treatment ($B = 0.049$, $SE = 0.017$, $t = 2.851$, $p = .004$), (c) the interaction involving African American officer race and procedurally just treatment ($B = 0.044$, $SE = 0.023$, $t = 1.963$, $p = .05$). The path analysis results are displayed in Figure 5.

Perceptions of police trustworthiness

Statistical predictors of police trustworthiness included the following: (a) Perceptions of police at baseline ($B = 0.730$, $SE = 0.021$, $t = 34.153$, $p < .001$), (b) Latinx officer race ($B = -0.068$, $SE = 0.033$, $t = -2.097$, $p = .036$), (c) procedurally just treatment ($B = 0.061$, $SE = 0.023$, $t = 2.607$, $p = .009$). The path analysis results are displayed in Figure 6.

Study 2 Conclusions

The first hypothesis for this study stated that participants viewed vignettes of White police officers will lower perceptions of police legitimacy and police trustworthiness than those that receive Black and Latinx police officers. The results of this study did not support this hypothesis. This is indicative of participants not seeing White police officers as less trustworthy or legitimate than Black and Latinx officers. The literature on diversifying the police force is inconsistent. Benton (2020) found that increased representation in the policing did not improve public perceptions of police. Contrarily, Pickett et al. (2023) found that participants are less afraid of police if the officer is non-White. This study concludes that race is not important when citizens evaluate police legitimacy and police perception.

The second hypothesis for this study stated that participants that viewed vignettes reflecting procedurally just treatment will have higher perceptions of police legitimacy and
police trustworthiness than those that viewed procedurally unjust treatment. Similar to the first hypothesis, the results did not support this hypothesis. Whether the individual was treated in a procedurally just manner did not affect their perceptions of police legitimacy and police trustworthiness. This finding differs from previous literature that suggests that procedural justice is a strong predictor for greater perceptions of police legitimacy and police trustworthiness (Bottoms & Tankebe, 2012; Gau & Brunson, 2010; Mazerolle & Terrill, 2020).

The third hypothesis for this study states that participants that viewed vignettes with negative discretionary outcomes will have lower perceptions of police legitimacy and police trustworthiness than those that viewed positive discretionary outcomes. Similar to the first two hypotheses, discretionary outcome did not affect perceptions of police legitimacy and police trustworthiness. Existing literature concerning police discretion often focus on their ability to select laws to enforce (Huff, 2021) and how officer discretion disproportionately affects ethnoracial minorities (Headley & Wright III, 2020; Huff, 2021). Though there was no effect found, this study contributes to existing policing literature by using discretionary outcomes as a predictor of perceptions of police legitimacy and police trustworthiness.

The fourth hypothesis stated that there will be an interaction between procedurally just treatment and discretionary outcome, such that when participants view an interaction of procedurally just treatment, there will be no differences in perceptions of police legitimacy and police trustworthiness between positive discretionary outcomes and negative discretionary outcomes. For those that received procedurally unjust treatment, judgments of police legitimacy and police trustworthiness will be higher those that received positive discretionary outcomes than those that received negative discretionary outcomes. This study found that when individuals are witness procedurally just behavior and the outcome of the interaction is not as important. This is
consistent with literature that posits that, when individuals are treated justly, they are less outcome driven (Tyler & Huo, 2002). However, there were also null findings when the participant in the vignette was treated unjustly. In other words, when participants are presented with negative discretionary outcomes, there were also no significant difference in perceptions of police legitimacy and police trustworthiness from those that received positive discretionary outcomes.

The fifth hypothesis states that Hypothesis 5 stated that there will be an interaction between police officer race and procedurally just treatment, such that when participants view an interaction with a police officer exhibiting procedurally unjust treatment, the perceptions of police legitimacy and police trustworthiness will be higher for those that receive Black and Latinx officer than those that receive a White officer. Additionally, those that view an interaction with a police officer exhibiting procedurally just treatment, there will be no such differences in perceptions of police legitimacy and police trustworthiness for those that viewed a Black and Latinx officer and those that viewed a White officer. This hypothesis was not supported. Participants did not consider police officer race as an influence of their perceptions of police legitimacy and police trustworthiness when witnessing procedurally just or unjust treatment. This finding provides a unique contribution to the literature, showing that the race of the officer is inconsequential as pertaining to procedurally just, or unjust behavior.

The final hypothesis states that that there will be an interaction between officer race and discretionary outcome, such that when participants viewed an interaction with a negative discretionary outcome, the perceptions of police legitimacy and police trustworthiness will be higher for those that receive a Black or Latinx officer than those that receive a White officer. This hypothesis is not supported. When presented with a negative discretionary outcome, the
race of the officer was not a factor in predicting differences in perceptions of police legitimacy and police trustworthiness. These results pose a unique contribution to existing literature concerning negative discretionary outcomes. Race of the officer is not a significant factor in predicting perceptions of police legitimacy or police trustworthiness.

Similar to Study 1, perceptions of police continue to be a focal predictor for police legitimacy and police trustworthiness. However, this study utilized perceptions of police as an outcome variable, and it was found that the race of the officer matters, such that those that received Latinx officers had lower perceptions of police. This effect persisted when combined with procedurally just treatment. Perceptions of police for Latinx officers being lower than White and African American officers is not supported by previous literature, which highlighted that individuals were more receptive of minority law enforcement officers (Riccucci et al., 2018).

This finding was consistent for police trustworthiness as well. When a police officer is African American, they have higher perceptions of police when individuals are being treated justly. This finding was maintained when looking at perceptions of police legitimacy and ratings of the police-citizen interaction. These results are consistent with literature that suggests that individuals view minority police officers in a better light than their White counterparts (Pickett et al., 2023). These results show that the race of the police matters in how citizens perceive police legitimacy, perceive police trustworthiness, and rate the interactions when individuals are being treated in a procedurally just manner. The difference in results when comparing the Latinx and the African American officer emphasizes the need for policing literature to not aggregate all non-White individuals into a singular category. Interaction ratings provides a new outlook on police-citizen interactions. Much of policing literature focuses on the administrative or personal outcomes of these interactions (Lloyd, 2020; Williamson et al., 2023), and less on how the
citizens involve rate their reactions to police. This could fill a gap in the literature that pairs well with using perceptions of police as a predictor, as opposed to an outcome.
Chapter 4: General Discussion

The relationship between police agencies and the communities they police has been the source of strife in America for decades (Department of Justice, 2015). It is important to determine ways to improve these relationships by identifying aspects of policing that could improve how citizens perceive police agencies. The purpose of these current studies was to examine how occupational attitudes associated with police culture, police officer race, procedurally just treatment, and discretionary outcomes affect citizens’ perceptions of police legitimacy and police trustworthiness. The first study investigated whether ratings of personal and vicarious experiences with police moderate the relationship between police officer occupational attitudes and perceptions of police trustworthiness.

These data showed that participants in the tough cop condition had higher perceptions of police trustworthiness than those in the professional police officer condition. Ratings of personal and vicarious experiences did not moderate the relationship between participant condition and perceptions of police legitimacy and police trustworthiness. Personal and vicarious experiences did not moderate this relationship. When participants rate police officers as more positive, they perceive police as more legitimate and more trustworthy. The second study investigated whether police officer race, procedurally just treatment, and discretionary outcome affects citizens perceptions of police legitimacy and police trustworthiness. These data showed that, above all of the aforementioned variables, perceptions of police were a driving factor in perceptions of police legitimacy and police trustworthiness. When perceptions of police were included in the model, a number of the hypothesized effects that were predicted materialized.

**Police Occupational Characteristics.**

Police culture is a manifestation of police history, organizational socialization, and officer occupational attitudes. Law enforcement is a crucial aspect of policing (Archbold, 2012).
As a result, the occupational culture in policing is reflective of law enforcement, often characterized by strict, elusive, and aggressive individuals (Paoline, 2004; Paoline & Terrill, 2014). As police officers are incorporated into the police agencies, they adapt to the workplace, the hours, and the duties of the job (Gubler et al., 2016; Mayer et al., 2009).

Arguably, one of the most important aspects of police culture are officer occupational attitudes. Officer occupational attitudes determine police officer occupational characteristics (Paoline, 2004). How police officers are characterized, with or without their awareness, affects how they behave within their departments and with the public (Terrill & Paoline, 2015). How officers behave affects how citizens are perceiving police agencies (Myhill & Bradford, 2012), ultimately influencing the relationship between police and the communities they police.

The first study investigated how police officer occupational characteristics is related to how citizens perceive police officers. While the hypothesis was not supported, the data showed that the higher the positivity ratings for police officers, the higher the perceptions of police legitimacy and police trustworthiness. In an exploratory analysis, it was found that individuals in the professional police officer experimental condition had rated their police officers as more positive than those in the tough cop condition. These results are consistent with literature positing that when citizens have more favorable opinions of police, they view them as more legitimate and more trustworthy (Hough, 2012; Tankebe, 2013; Trinkner et al., 2019). However, the addition of citizens’ perceptions of police occupational characteristics, more specifically, how positively they rate police officers that embody those characteristics, provides an empirical connection between literature only outlining policing culture (McLean et al., 2020; Paoline, 2004; Terrill & Paoline, 2015) and literature only outlining citizens’ perceptions of police legitimacy and police trustworthiness (Sunshine & Tyler, 2003b; Tyler et al., 2010) that has not
been pursued before. These data highlighted that when police officers embody occupational characteristics consistent with community orientation and police professionalization, citizens have more favorable perceptions than those that exhibit characteristics consistent with being aggressive (e.g., the tough cop) or indifferent (e.g., the avoider). This is an important addition to empirical literature surrounding citizen-police relationships, because it separates citizens’ perceptions of police from the outcomes of police interactions and shifts focus to police officer culture as it exists within policing agencies.

**Aspects of Police Interactions.**

In the second study, police officer race, procedurally just treatment, and discretionary outcomes were used to predict citizens’ perceptions of police legitimacy and police trustworthiness. This study did not find evidence supporting that (a) differences in police officer race, (b) differences in procedurally just treatment, or (c) differences in discretionary outcomes influenced citizens’ perceptions of police legitimacy and police trustworthiness. While these are solutions presented by police reformists as ways to positively influence citizens’ relationships with police (Department of Justice, 2015; Fair, 2023; Green et al., 2022), this study did not find evidence of this being true.

The lack of support for this hypothesis may be a result of the demographics of the study; the sample is majority White, cisgender women, with an average age of 40 years old. Research has shown that individuals in these demographics are among the least likely to have negative interactions with the police (Bolger et al., 2021; Motley Jr. & Joe, 2018). This fact may affect how individuals perceived the police interaction, possibly placing themselves in as the citizen, due to the design of the vignette not providing that information. There is also the possibility that
individuals may be more aware of the differences between police officers as individuals and what they represent as an institution.

Police reformists have continued to highlight that, where policing is concerned, a few bad apples come from rotten trees. The structural foundation of policing agencies is deep-rooted in racism and inequality, the byproducts of these agencies reflect that same racism and inequality (Cunningham, 2020; Ray, 2020). This highlights the need to shift the perceptions police agencies overall, which is reflected in the way police officers view themselves and their occupation (Paoline, 2004). When coupled with the results of the first study, these results show how important it is for police officers to represent good institutions with good values, as opposed to solely relying on what police officers look like and the outcome of the interactions. While diversifying police agencies, treating citizens procedurally just, and having more positive outcomes is important, it should no longer be the sole focus of police reform research geared toward improving relationships between citizens and police.

Perceptions of Police.

How citizens perceive police is important to the relationship between police and citizens (Maguire et al., 2010). Traditionally, research surrounding perceptions of police examines how a variety of predictors, such as participant race (Nadal et al., 2017) and procedurally just treatment (Donner et al., 2015), influence perceptions of police, there is a considerable gap in the literature that uses perceptions of police as a predictor, rather than an outcome. What was found in both of these studies is that perceptions of police played an important role in the interpretation of the findings concerning the evaluation of citizens’ perceptions of police culture.

In the first study, it was found that when citizens had higher perceptions of police, they rated police as more legitimate and more trustworthy. In the second study, being treated
procedurally just was a predictor of perceptions of police at follow-up, police legitimacy, police trustworthiness and ratings of the interaction. Officer race also had a predictive role in many of these outcome variables, as being treated justly when the officer was African-American enhanced perceptions of police at follow-up, enhanced police legitimacy and enhanced the interaction rating. These findings lend support to the call to create a more diverse police force.

Ironically, the officer being Latinx was associated (relative to the unweighted grand mean) of having reduced scores on perceptions of police at follow-up and trust in police. This suggests that, although there can be administrative changes in police departments, such as diversifying agencies, incorporating procedurally just policies, and aiming for positive discretionary outcomes, how citizens perceive police is important when determining how citizens view aspects of policing, such as their legitimacy and trustworthiness. Further study is needed to fully understand the role of Latinx officers on perceptions of police, which should focus on how the Latinx identity can vary within groups (Tanaka et al., 1998).

These studies showed that changing perceptions of police may require time, consideration, and a renewed focus on police culture itself, rather than the administrative byproducts of the institution. The shift to improve police culture is similar to the push for community policing. Facets of community policing is rooted in the guardian mentality, ensuring that police officers focus on serving the community (Brown, 2020; Stoughton, 2015). The push behind community policing initiatives revolves around breaking down the wall between police agencies and citizens (Archbold, 2021). While attempting to shift police agencies to community policing, in an effort to improve the relationship between police and citizens, changing police culture may be an unintended byproduct. These studies have added to the empirical support for how initiatives to improve perceptions of police.
**Future Directions.**

Perceptions of police is commonly used as an outcome variable in policing literature (Johnson et al., 2017; Owen et al., 2018; Taylor et al., 2020). While these studies looked at perceptions of police as both predictor and outcome variables, future research would benefit from continuing that trend. Based on previous literature, perceptions of police may mediate relationships between certain predictor and outcome variables, such as the relationship between perceived police officer occupational attitudes and perceptions of procedural fairness. This mediatational mechanism may lend a hand to researchers trying to account for the more variability in models investigating different facets of citizens’ perceptions of police.

Perceptions of police also has two facets: one that denoted general attitudes towards police and another that denotes perceptions of police bias (Nadal & Davidoff, 2015). While these studies did not utilize these separate facets, future empirical research may benefit from investigating perceptions of police as both an overall scale and by its subscales. This use of the subscales would be beneficial for determining how much perception of police bias affects citizens’ relationships with police officers. The first study created a space in policing literature to explore citizens’ perceptions of police culture. Future research would benefit from capturing how citizens perceive different aspects of police culture. This may be better able to speak to the relationship between how citizens perceive police agencies outside of policing interactions and their outcomes.

**Broader Impact.**

Police officers are indoctrinated into a very particular police culture that has become increasingly isolated. This culture may no longer be in line with the notion that police officers are public servants and guardians of their community. Due to this cultural depiction, public
perceptions of police officers have continued to trend negatively. As a result, police officers are feeling more targeted and isolated from the public and the public is feeling less trusting of the police. These studies have identified how certain police occupational characteristics affects how positively citizens view police officers, which in turn influences citizens perceptions of police legitimacy and police trustworthiness. They have also showed that perceptions of police are an important predictor of citizens’ perceptions of police legitimacy and police trustworthiness. 

Focusing on how to improve perceptions of police as a predictor when discussing elements of citizen-police relationships, as opposed to how other elements predict perceptions of police has shown to be beneficial. Additionally, targeting police culture can bring forth interventions of how to change public perceptions of police as an institution, rather than perceptions of police primarily as a reflection of interaction outcomes. Interventions such as a renewed focus on community policing or changes in police behavior policies to reflect professionalism could incorporate police culture in ways that could change public perceptions. These studies have provided empirical evidence that would support such interventions.
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Table 3.

Means, standard deviations, and correlations for Police Legitimacy, Police Trustworthiness, Perceptions of Police Before the Manipulation, Perceptions of Police After the Manipulation, and Satisfaction Ratings for Personal and Vicarious Experiences.

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<th>4</th>
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<td>8. Social Media Use</td>
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<td>.01</td>
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<td>.02</td>
<td>.02</td>
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*Note.* * indicates $p < .05$. ** indicates $p < .01$. 

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Table 5

*Means, standard deviations, and correlations with for Police Legitimacy, Police Trustworthiness, Perceptions of Police, and Positivity Ratings for those with Neither Personal nor Vicarious Experience*

<table>
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<tr>
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</tr>
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<tr>
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<td>.25*</td>
<td>.29**</td>
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*Note.* * indicates $p < .05$. ** indicates $p < .01$. 
Table 6

Means, standard deviations, and correlations with for Police Legitimacy, Police Trustworthiness, Perceptions of Police, and Positivity Ratings for those with Personal Experiences Only.

<table>
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<tr>
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<tr>
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Note. * indicates $p < .05$. ** indicates $p < .01$. 
Table 7

*Means, standard deviations, and correlations with for Police Legitimacy, Police Trustworthiness, Perceptions of Police, and Positivity Ratings for those with Vicarious Experiences Only.*

<table>
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*Note.* * indicates $p < .05$. ** indicates $p < .01$. 
Table 9.

Means, standard deviations, and correlations for Police Legitimacy, Police Trustworthiness, Perceptions of Police Before the Manipulation, Perceptions of Police After the Manipulation, and Police Interaction Ratings

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<tr>
<td>3. Perceptions of Police Before</td>
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<td>.89**</td>
<td>.86**</td>
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<td>-.12*</td>
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Note. M and SD are used to represent mean and standard deviation, respectively. * indicates $p < .05$. ** indicates $p < .01$. 
Figure 3: A model of the path analysis with Perceptions of Police at Baseline, Effect coded Latinx Officer, Effect coded Procedurally Just Treatment, Effect coded Favorable Discretionary Outcome, Interaction of African American Officer and Procedurally Just Treatment, and Interaction of Latinx Officer and Procedurally Just Treatment predicting Perceptions of Police at Follow-Up.

Note: * indicates $p < .05$. ** indicates $p < .01$. *** indicates $p < .001$. 

Perceptions of Police at Baseline  
*** B = 0.977

Effect coded Latinx Officer  
* B = -0.044

Effect coded Procedurally Just Treatment  
*** B = 0.089

Effect coded Favorable Discretionary Outcome  
* B = -0.029

Interaction of African American Officer and Procedurally Just Treatment  
* B = 0.054

Interaction of Latinx Officer and Procedurally Just Treatment  
* B = -0.042
Figure 4: A model of the path analysis with Perceptions of Police at Baseline, Effect coded Procedurally Just Treatment, Interaction of African American Officer and Procedurally Just Treatment, and Interaction of Perceptions of Police at Baseline and Procedurally Just Treatment predicting Perceptions of Interaction Rating.

Note: * indicates $p < .05$. ** indicates $p < .01$. *** indicates $p < .001$. 

**Perceptions of Police at Baseline** *** $B = 0.423$

**Effect coded Procedurally Just Treatment** *** $B = 0.970$

**Interaction of African American Officer and Procedurally Just Treatment** * $\beta = 0.148$

**Interaction of Perceptions of Police at Baseline and Procedurally Just Treatment** * $\beta = 0.105$
Figure 5: A model of the path analysis with Perceptions of Police at Baseline, Effect coded Procedurally Just Treatment, and Interaction of African American Officer and Procedurally Just Treatment predicting Perceptions of Police Legitimacy.

Note: * indicates $p < .05$. ** indicates $p < .01$. *** indicates $p < .001$. 
Figure 6: A model of the path analysis with Perceptions of Police at Baseline, Effect coded Latinx Officer, and Effect coded Procedurally Just Treatment predicting Perceptions of Police Trustworthiness.

Note: * indicates $p < .05$. ** indicates $p < .01$. *** indicates $p < .001$. 
Appendix A

Demographics

Race/Ethnicity

- **Hispanic or Latino or Spanish Origin of any race**
- **Not Hispanic or Latino or Spanish Origin**
  - White or Caucasian
  - Black or African American
  - American Indian or Alaskan Native
  - Asian
  - Native Hawaiian or Pacific Islander
  - Two or more races
  - Non-Resident
  - Race and Ethnicity Unknown

Gender Identity: How do you identify?

- Woman
- Man
- Transgender
- Gender non-conforming
- Prefer to self-describe here
- Prefer not to answer

Age

List your age:

Education: select your highest level of education

- Less than a high school degree
- High school degree or equivalent (G.E.D.)
- Some college, but no degree
- Associate’s degree
Bachelor’s degree
Graduate degree

Political Orientation (sliding scale)
Consistently conservative
Mostly conservative
Mixed
Mostly liberal
Consistently liberal
Appendix B
Study 1 Police Officer Stimuli

Positive Police Characteristics

B

Name: Deputy Derrick Mitchell
Hometown: St. Louis, Missouri
Favorite Parts About the Job:
- Connecting with my community
- Helping citizens get better outcomes
- Duty of responsibility to the public

B

Name: Deputy Terry Price
Hometown: Boston, Massachusetts
Favorite Parts About the Job:
- Helping the community anyway I can
- Appreciating interacting with civilians
- Working with my supervisors
Name: Deputy Oscar Garcia

Hometown: Houston, Texas

Favorite Parts About the Job:

Meeting people from all over

Having a positive rapport with people

Expanding my role with the community

Name: Deputy Thomas Choi

Hometown: Notre Dame, Indiana

Favorite Parts About the Job:

Working with different people

Changing my department for the better

Protecting the community I love
Negative Police Characteristics

Name: Deputy Derrick Mitchell
Hometown: St. Louis, Missouri
Favorite Parts About the Job:
   Maintaining law and order
   Catching real criminals
   Feeling like a crime fighter

Name: Deputy Terry Price
Hometown: Boston, Massachusetts
Favorite Parts About the Job:
   Getting to arrest criminals
   Attacking crime head on
   Maintaining public order
Name: Deputy Oscar Garcia
Hometown: Houston, Texas
Favorite Parts About the Job:
   Making daily arrests
   Enforcing the law
   Stopping big and small criminals

Name: Deputy Thomas Choi
Hometown: Notre Dame, Indiana
Favorite Parts About the Job:
   Keeping criminals in line
   Doing real police work
   Catching violations in the act
Neutral Characteristics

Name: Deputy Derrick Mitchell
Hometown: St. Louis, Missouri
Favorite Parts About the Job:
  - Handling regular criminals
  - Working with my colleagues
  - Wearing the uniform

Name: Deputy Terry Price
Hometown: Boston, Massachusetts
Favorite Parts About the Job:
  - Handling unavoidable situations
  - Keeping people out of trouble
  - Writing tickets and citations
Name: Deputy Oscar Garcia

Hometown: Houston, Texas

Favorite Parts About the Job:

- Having a rigid work schedule
- Patrolling the neighborhoods
- Working with my partner

Name: Deputy Thomas Choi

Hometown: Notre Dame, Indiana

Favorite Parts About the Job:

- Getting different experiences
- Being supported by supervisors
- Working with my department
Appendix C

Manipulation Check Study 1

1. From the list below, please indicate how you viewed the officers’ outlooks on their jobs.
   a. Deputy Derrick Mitchell
      i. Very Negative
      ii. Negative
      iii. Neither Negative nor Positive
      iv. Positive
      v. Very Positive
   b. Deputy Terry Price
      i. Very Negative
      ii. Negative
      iii. Neither Negative nor Positive
      iv. Positive
      v. Very Positive
   c. Deputy Oscar Garcia
      i. Very Negative
      ii. Negative
      iii. Neither Negative nor Poor
      iv. Positive
      v. Very Positive
   d. Deputy Thomas Choi
      i. Very Negative
      ii. Negative
      iii. Neither Negative nor Positive
      iv. Positive
      v. Very Positive
Appendix D

Police Legitimacy

Response: 1= strongly disagree; 4= strongly agree.

Lawfulness

1. When the police deal with people, they always behave according to the law.
2. If I were to talk to police officers in my community, I would find their values to be very similar to my own.
3. The police act in way that are consistent with my own moral values.

Procedural fairness

1. The police treat citizens with respect.
2. The police take time to listen to people.
3. The police treat people fairly.
4. The police respect citizens' rights.
5. The police are courteous to citizens they come into contact with.
6. The police treat everyone with dignity.
7. The police make decisions based on the facts.

Distributive fairness

1. The police provide the same quality of service to all citizens.
2. The police enforce the law consistently when dealing with people.
3. The police make sure citizens receive the outcomes they deserve under the law.

Police effectiveness

1. Crime levels in my neighborhood have changed for the better in the last year.
2. There are not many instances of crime in my neighborhood.
3. I feel safe walking in my neighborhood at night.
Appendix E

Police trustworthiness

Response: 1= strongly disagree; 4= strongly agree.

1. The local police are trustworthy.
2. I am proud of the police in my area.
3. I have confidence in my local police department.
4. The local police are often dishonest (reverse coded).
5. The local police are usually honest.
6. The local police always act within the law.
Appendix F

Personal and Vicarious Police Interactions

Personal Experiences of Police Interactions

1. In the last 5 years, have you personally had contact with the police?
   a. Yes
   b. No
2. Think of your last encounter with the police. How would you rate that experience?
   a. 1=Completely dissatisfied, 7=Completely Satisfied.
3. Was the contact with the police-initiated by the police “e.g., traffic stop” or self-initiated “e.g., reported a crime”?
   a. Police-Initiated
   b. Self-Initiated
   c. Initiated by Someone Else.
4. How would you rate the outcome of the interaction with the police?
   a. 1=Extremely negative, 7=Extremely positive

Vicarious Experiences of Police Interactions

1. In the last 5 years, has a family member, close friend, or person in your community had contact with the police?
   a. Yes
   b. No
2. Think of their encounter with the police. How would you rate that experience?
   a. 1=Completely dissatisfied, 7=Completely Satisfied.
3. Was the contact with the police-initiated by the police “e.g., traffic stop” or self-initiated “e.g., reported a crime”?
   a. Police-Initiated
   b. Self-Initiated
   c. Initiated by Someone Else.
4. How would you rate the outcome of the interaction with the police?
   a. 1=Extremely negative, 7=Extremely positive
Appendix G

Perceptions of Police Scale

Response: 1 = strongly disagree; 5 = strongly agree

Instructions: Rate the degree to which you agree with this statement.

1. Police officers are friendly.
2. Police officers protect me.
3. Police officers treat all people fairly.
4. I like the police.
5. The police are good people.
6. The police do not discriminate.
7. The police provide safety.
8. The police are helpful.
9. The police are trustworthy.
10. The police are reliable.
11. Police officers are unbiased.
12. Police officers care about my community.
Appendix H

Social Media Use Integration Scale

Response: 1= strongly disagree; 6= strongly agree.

Social Integration and Emotional Connection

1. I feel disconnected from friends when I have not logged into social media
2. I would like it if everyone used social media to communicate
3. I would be disappointed if I could not use social media at all
4. I get upset when I can’t log on to social media
5. I prefer to communicate with others mainly through social media
6. Social media plays an important role in my social relationships

Integration into Social Routines

7. I enjoy checking my social media account
8. I don’t like to use social media (r)
9. Using social media is part of my everyday routine
10. I respond to content that others share using social media
Appendix I

Police Officer Interaction Vignettes

Black/Just Treatment/Positive Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road an African American police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible.’ Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car.’

The individual is then asked to explain where they have come from, and the police officer listens patiently. The police officer then explains ‘I have just received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer explains that it is his duty to ensure the public remains safe. The police officer pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer confiscates the marijuana from the individual. The officer then politely asks the individual for their contact details, provides his own badge number to the individual, and invites them to ask any questions before leaving, and apologizes for causing them any inconvenience. The officer thanks them and says they are free to go. The police officer returns to his patrol car and drives away.
Black/Unjust Treatment/Positive Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road an African American police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The police officer then raises his voice at the individual and demands to know where the individual has come from. When the individual tries to explain where they have been the officer cuts them off mid-sentence. The police officer states ‘I have received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer then roughly pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer confiscates the marijuana from the individual. The officer then makes a condescending comment about the person’s appearance and takes down the person’s contact details. The police officer tells the individual they have wasted his time but tells them they are free to go. The police officer returns to his patrol car and drives away.
Black/Just Treatment/Negative Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road an African American police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The individual is then asked to explain where they have come from, and the police officer listens patiently. The police officer then explains ‘I have just received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer explains that it is his duty to ensure the public remains safe. The police officer pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer writes the individual a citation and a summons for court. The officer then politely asks the individual for their contact details, provides his own badge number to the individual, and invites them to ask any questions before leaving, and apologizes for causing them any inconvenience. The officer thanks them and says they are free to go. The police officer returns to his patrol car and drives away.
Black/Unjust Treatment/Negative Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road an African American police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The police officer then raises his voice at the individual and demands to know where the individual has come from. When the individual tries to explain where they have been the officer cuts them off mid-sentence. The police officer states ‘I have received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer then roughly pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer writes the individual a citation and a summons for court. The officer then makes a condescending comment about the person’s appearance and takes down the person’s contact details. The police officer tells the individual they have wasted his time but tells them they are free to go. The police officer returns to his patrol car and drives away.
**White/Just Treatment/Positive Outcome**

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a *White* police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The individual is then asked to explain where they have come from, and the police officer *listens patiently*. The police officer then explains ‘I have just received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer *explains* that it is his duty to ensure the public remains safe. The police officer pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer *confiscates the marijuana from the individual*. The officer then *politely* asks the individual for their contact details, *provides his own badge number* to the individual, *and invites them to ask any questions* before leaving, and *apologizes* for causing them any inconvenience. The officer *thanks* them and says they are free to go. The police officer returns to his patrol car and drives away.
White/ Unjust Treatment/Positive Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a White police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The police officer then raises his voice at the individual and demands to know where the individual has come from. When the individual tries to explain where they have been the officer cuts them off mid-sentence. The police officer states ‘I have received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer then roughly pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer confiscates the marijuana from the individual. The officer then makes a condescending comment about the person’s appearance and takes down the person’s contact details. The police officer tells the individual they have wasted his time but tells them they are free to go. The police officer returns to his patrol car and drives away.
White/Just Treatment/Negative Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a White police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The individual is then asked to explain where they have come from, and the police officer listens patiently. The police officer then explains ‘I have just received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer explains that it is his duty to ensure the public remains safe. The police officer pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer writes the individual a citation and a summons for court. The officer then politely asks the individual for their contact details, provides his own badge number to the individual, and invites them to ask any questions before leaving, and apologizes for causing them any inconvenience. The officer thanks them and says they are free to go. The police officer returns to his patrol car and drives away.
White/ Unjust Treatment/Negative Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a White police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The police officer then raises his voice at the individual and demands to know where the individual has come from. When the individual tries to explain where they have been the officer cuts them off mid-sentence. The police officer states ‘I have received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer then roughly pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer writes the individual a citation and a summons for court. The officer then makes a condescending comment about the person’s appearance and takes down the person’s contact details. The police officer tells the individual they have wasted his time but tells them they are free to go. The police officer returns to his patrol car and drives away.
Latino/ Just Treatment/Positive Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a Latino police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The individual is then asked to explain where they have come from, and the police officer listens patiently. The police officer then explains ‘I have just received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer explains that it is his duty to ensure the public remains safe. The police officer pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer confiscates the marijuana from the individual. The officer then politely asks the individual for their contact details, provides his own badge number to the individual, and invites them to ask any questions before leaving, and apologizes for causing them any inconvenience. The officer thanks them and says they are free to go. The police officer returns to his patrol car and drives away.
Latino/Unjust Treatment/Positive Outcome

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a Latino police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The police officer then raises his voice at the individual and demands to know where the individual has come from. When the individual tries to explain where they have been the officer cuts them off mid-sentence. The police officer states ‘I have received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer then roughly pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer confiscates the marijuana from the individual. The officer then makes a condescending comment about the person’s appearance and takes down the person’s contact details. The police officer tells the individual they have wasted his time but tells them they are free to go. The police officer returns to his patrol car and drives away.
**Latino/Just Treatment/Negative Outcome**

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a Latino police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The individual is then asked to explain where they have come from, and the police officer listens patiently. The police officer then explains ‘I have just received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer explains that it is his duty to ensure the public remains safe. The police officer pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. The officer writes the individual a citation and a summons for court. The officer then politely asks the individual for their contact details, provides his own badge number to the individual, and invites them to ask any questions before leaving, and apologizes for causing them any inconvenience. The officer thanks them and says they are free to go. The police officer returns to his patrol car and drives away.
**Latino/Unjust Treatment/Negative Outcome**

An individual is driving home after work on a Friday night when they are pulled over by a police patrol car. As they wait in their car at the side of the road a *Latino* police officer approaches the driver’s side of the car with his hand on his gun. The police officer says: ‘Step out of the car and keep your hands visible’. Once the individual is out of the car the police officer states ‘I will be undertaking a search of both you and your car’.

The police officer then *raises his voice* at the individual and *demands* to know where the individual has come from. When the individual tries to explain where they have been the officer cuts them off mid-sentence. The police officer states ‘I have received reports of a person attempting to stab members of the public and your car fits the description of a car seen fleeing the scene. I am responding to a suspected violent incident.’

The police officer then *roughly* pats the individual down and begins his search of the car. The police officer finds nothing to suggest the person was involved in any violent incident, but does find marijuana. *The officer writes the individual a citation and a summons for court.* The officer then *makes a condescending comment about the person’s appearance* and takes down the person’s contact details. The police officer *tells the individual they have wasted his time* but tells them they are free to go. The police officer returns to his patrol car and drives away.
Appendix J

Manipulation Check Study 2

1. Please indicate the race of the officer described in the story.
   a. Black
   b. White
   c. Latino
Appendix K

Interaction Rating

Response: 1= extremely satisfied; 5= extremely dissatisfied.

1. How satisfied are you with the outcome of the interaction between the person described in the vignette and the police officer?
2. How satisfied are you with the way the police officer treated the individual described in the vignette?
3. How satisfied are you with the overall interaction between the person described in the vignette and the police officer?
Vita

Kityara U. James received her Bachelor of Science in Psychology from Georgia Southern University: Armstrong Campus FKA Armstrong State University (Savannah, GA) in 2018. During her gap year, she pursued a career as a social worker, working in therapeutic foster care.

At the University of Texas at El Paso, Kityara primarily researches minority law enforcement and intersectionality discrimination, looking at hair discrimination being a proxy for racial discrimination in Black women and men. She earned her Masters in Experimental Psychology in 2023.