# NEW MEXICO SENTENCING COMMISSION

SENTENCING COMMISSION STAFF

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# Summary

- New Mexico is unique because the majority race/ethnicity group is Hispanic/Latino.
- For the purposes of this analysis Non-Hispanic White youth are used as the reference group to maintain consistency with other research.
- OJJDP has chosen the use of RRIs to guide intervention efforts at targeted decision points where DMC is occurring.
- Generally, the differences between Non-Hispanic White and minority youth were decreasing from 2006 - 2010.
- Most of the differences in the RRIs remained statistically significant in 2010, however the magnitude of the difference was considerably less than it was in 2006.
- RRIs do not control for factors such as the severity of the referring offense, prior delinquency and FINS referrals, age, or gender. In our analysis these factors are included along with race/ethnicity of the youth and region.
- In our analysis, severity of referring offense, prior delinquency and FINS referrals were the strongest predictors of whether or not a youth was referred to CCA or received a sanction of commitment to a CYFD facility independently of race/ethnicity.

# State of New Mexico Disproportionate Minority Contact Statewide Assessment: Preliminary Report

Executive Summary

INTRODUCTION

Disproportionate minority contact (DMC) is defined as an overrepresentation of minority youth at any stage within the juvenile justice system (Huizinga et al., 2007).

The nine stages within the juvenile justice system are: arrest; referral; diversion; case petitioned; secure detention; delinquency finding; probation; confinement in secure correctional facility; and case transferred, certified, and waived to adult court (OJJDP, 2009A).

The DMC mandate of the federal Office of Juvenile Justice and Delinquency Prevention (OJJDP) requires states to institute multipronged intervention strategies including juvenile delinquency prevention efforts and system improvements to assure equal treatment of all youth.

OJJDP requires states to complete an assessment that is submitted with their 3-Year Plan. Since June 2009, CYFD has contracted with the New Mexico Sentencing Commission (NMSC), which is housed at the Institute for Social Research (ISR) at the University of New Mexico (UNM) to provide research services including the completion of the state's assessment report.

# State and Local DMC Delinquency Prevention and Systems Improvement Strategy

New Mexico has a history of DMC efforts. These efforts include DMC specific efforts as well as broader system improvements and strategies that impact the entire juvenile justice system. Like many states, New Mexico has taken a broad approach that includes DMC efforts as well as detention reform and diversion from formal contact with the juvenile justice system.

The Juvenile Justice Services (JJS) division of the Children, Youth and Families Department (CYFD) is primarily responsible for DMC delinquency prevention and systems improvements in New Mexico. Part of New Mexico's strategy is to network with minority group advocates by developing and implementing strategies for collaborative programs and educational efforts. Technical assistance has also helped New Mexico's efforts. Targeted training programs for specific audiences such as law enforcement and judges have been developed that are designed to help address this problem. A major change that has been implemented is a detention-screening process called the Screening Admissions and Releases Application (SARA), which use an instrument named the Risk Assessment Instrument (RAI). The RAI provides a mechanism for the equitable and consistent screening of children referred for detention statewide.

The Juvenile Justice Advisory Committee (JJAC) is appointed by the Governor and is advisory to CYFD, the Governor and the

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# **RELATIVE RATE INDEX**

The Relative Rate Index (RRI) is a first step in examining DMC. The RRI compares the rate at a particular stage for Non-Hispanic White youth with the rate for minority youth. OJJDP has chosen the use of RRIs to guide intervention efforts at targeted decision points where DMC is occurring.

New Mexico is unique because the majority race/ethnicity group is Hispanic/Latino. For the purposes of this analysis Non-Hispanic White is still used as the reference group in the interest of consistency in interpretation with other research.

Increasing values across time in RRI values indicate increasing levels of DMC, while decreasing values indicate decreasing amounts of DMC. RRI values close to 1.0 indicate that there are not large differences between Non-Hispanic White and minority youth. Any RRI with a value of less than one indicates an under-representation of minority at that stage. Figures 1-9 contain the statewide RRI values from 2006 -2010.

- Generally, the differences between Non-Hispanic White and minority youth were decreasing from 2006 - 2010. Most of the differences remained statistically significant in 2010, however the magnitude of the difference was considerably less than it was in 2006.
- The RRI for delinquent findings for minority youth were similar to Non-Hispanic White youth with no statistically significant differences in 2010.
- The arrest RRI trend for African American youth decreased from a high of 2.0 African American youth being arrested for every Non-Hispanic White youth arrested in 2005 to a low in 2010 of 1.1 African American youth being arrested for every Non-Hispanic White youth arrested.
- The arrest RRI for Hispanic/Latino youth was relatively stable from 2005 2010. More Hispanic youth were arrested compared to Non-Hispanic White youth, however on average for every Non-Hispanic White youth arrested, 1.8 Hispanic/Latino youth were arrested.
- Native American youth were less likely to be arrested, referred, or get probation.
- For all minorities, the RRI for confinement decreased for 2005 2010. The decrease is particularly noticeable for African Americans where the RRI decreased from 3.3 in 2005 to 1.4 in 2010.
- The RRI for cases referred to court remained constant with an average of 1.85 between the years of 2005 and 2007, then dropped to an average of 1.12 for years 2008-2010.
- For cases transferred to adult court, the RRI for All Minorities started at 1.39 in 2005 and then decreased in 2007 to 1.19. There were an insufficient number of cases for analysis in 2008-2010.



















### Continued from Page 1

Legislature. JJAC advocates for the prevention of delinquency, alternatives to secure detention, improvement of the juvenile justice system and the development of a continuum of graduated sanctions for juveniles in local communities. The JJAC allocates federal and state grant funds to communities in New Mexico for these purposes. JJAC is responsible for carrying out the requirements of the Juvenile Justice and Delinquency Prevention (JJDP) Act and is responsible for developing the state's 3-Year Plan and administering the formula grants program. Nineteen regional Juvenile Justice Continuum Boards have been developed in communities that serve 21 counties across the state to address the goals of JJAC. Regional Juvenile Justice Continuum Boards:

- Analyze local trends of youth at risk
- Assess community resource gaps that effect youth and families
- Build partnerships with key community leaders that positively impact policy regarding youth
- Fund programming that directly impacts the concerns and issues facing our youth
- Involve community leaders and experts to address youth and family issues
- These boards help implement best practice programs to prevent youth from getting into trouble and to provide local sanctions and services that divert youth from commitment to state facilities

As part of NMSC's contract with CYFD, a multi-stage study of juvenile justice programs funded by the JJAC in nine New Mexico counties is in the process of being conducted. Since these programs focus on prevention and not DMC specifically, the findings of this study are not discussed here. CYFD has been provided with reports from the first two stages, and the reports for the third and fourth stages will be completed by June 30, 2012.

### **DMC Continuum Sites**

From 2009 – 2010, there were three DMC reduction programs. The City of Las Cruces, in Dona Ana County, focused on determining the contact points to be addressed through a best practice model, assessment and data analysis. The City of Santa Fe, in Santa Fe County, developed a Restorative Justice project that identified high-risk youth in three primarily Hispanic elementary and one middle school. The town of Taos, in Taos County, assessed contact points data and determined best practice programs needed in the community.

From 2010 – 2011, there were three additional DMC reduction programs. Bernalillo County in collaboration

with the La Pazita in the south valley with zip codes 87121 and 87105 set a DMC goal of reducing detention populations of minority youth from that specific zone. The Sandoval County DMC project involved the planning and facilitation of a town hall meeting format with five communities to determine patterns of disparities related to contact issues with the juvenile justice system. The Santa Fe County DMC project addressed factors associated with disparities in an effort to keep youth from being arrested. The project targeted high-risk youth at two elementary and middle schools levels. The determinate used consisted of behaviors that were major violations of the schools code of conduct.

# QUANTITATIVE ASSESSMENT

The statewide RRIs analysis for New Mexico provides evidence of DMC at some contact points (pages 2-3). It is important to recognize that RRIs are one dimensional only looking at the percentage of each group relative to the Non-Hispanic White group using potentially duplicated individuals (for example if a youth has two referrals in one year they are counted twice in the referral count) at each contact point and do not control for factors such as the severity of the referring offense, prior delinquency referrals, age, or gender.

Is there evidence of disparate treatment of minority youth compared to Non-Hispanic White youth when severity of offense, previous delinquency referrals, and other demographic variables are taken into account? This question is addressed using a data-driven quantitative methodology discussed below.

#### **Contact Points Studied**

The analysis of RRI trends discussed above guided our selection of contact points to include in our analysis. Analysis of all contact points, and sub-analysis at the county level was not feasible given the small number of observations at later contact points when broken out by county. Our analysis is limited to the state at three decision points. These decision points are:

- 1. Referral to CCA
- 2. Delinquency finding
- 3. Sanctions Time Waiver/Consent Decree/ Probation/Detention/Commitment

## Potential Mechanisms of DMC

CYFD JJS Data Analysis/FACTS Bureau provided data for this analysis. All juveniles referred in FY07 – FY09, regardless of the referral source, aged 10 to 21 and for who the most severe charge was not a probation violation were included. A more detailed description of the methodology is located at the end of this report.

#### Explanatory Variables

Particular variables proxy as potential causes of DMC at each decision point. For differential offending arrest/ referral charge categories were constructed from severity and crime category to represent the current referral and petition charges. For example, if a juvenile was arrested for a property crime, and that crime is classified as a felony then that juvenile will have a yes indicator for the variable Property Crime Felony Charge. Juveniles are only counted in one offense category that represents their most severe charge at referral and petition.

Offense history, or an indicator for more frequent involvement is measured by two variables; counts of delinquent priors handled informally and those referred to the CCA. Counts of FINS priors treated informally are a proxy for other contacts with CYFD. Age is in single years. Males are compared to females. Additionally a region variable was created using the CYFD regions. The effect of each region is measured relative to Region 3, Bernalillo County, which has the largest number of referrals.

The fact that other variables are held constant in a logistic regression model enables us to compare the probability of the more severe outcome of all other minorities versus Non-Hispanic White. Hispanic, African American and Native American are compared separately.

## Dependent Variable Contact Point One: Probability of Being Referred to Children's Court

Once a juvenile is arrested or referred to JJS a preliminary inquiry is conducted by a juvenile probation officer (JPO). The juvenile's case may be referred to the Children's Court Attorney (CCA) for further action or it may be handled informally (Children, Youth and Families Department, 2009A). The dependent variable is composed of two opposite (or dichotomous) outcomes: referred to the CCA (yes-CCA) or handled informally (no-CCA). The model results are interpreted as the magnitude and direction of each of the explanatory variables (potential mechanisms) including demographic variables to the probability of being referred to the CCA.

# Dependent Variable Contact Points Two and Three: Petition Outcome

Once a petition is filed, the case is heard by a judge who makes a decision. Juveniles can be found to have committed a delinquent act or the charges are dismissed or nolle prosequi (Children, Youth and Families Department, 2009B). The dichotomy of being adjudicated delinquent versus dismissed or nolled could be modeled separately, however for the purposes of this analysis the sanctions that youth receive will be further broken out rather than included in a separate model.

For petitions that are not dismissed, there are five possible outcomes. The juvenile can either have a disposition of time waiver, consent decree, judge ordered probation, sentenced to detention, or commitment. A time waiver gives youth the chance to have their petition nolled or dismissed if conditions are followed for six months and there are no new referrals during that time period. A consent decree provides youth with an opportunity to earn a clean record after successful completion of a period of probation. Since both time waivers and consent decrees give youth the option of having a clean record after completing probation they are grouped separately from judge ordered probation. Judges can order youth to spend 15 days detention in a local detention facility or a longerterm commitment to a CYFD facility.

The dependent variable ranks petition outcome in the following order: petition dismissed or nolled, time waiver/consent decree, judge ordered probation, sentenced to detention, and commitment. The model results are interpreted in magnitude and direction for each explanatory variable on the odds of a youth receiving a commitment compared to the combined effect of the other petition outcomes with all other variables being held constant.

The primary reason for using a combined model is the lack of variation in the dependent variable at the sanction stage. Nearly 92% of juveniles who reach that contact point receive a probation sanction (time waivers, consent decrees, judge ordered probation) while 8% receive secure confinement (detention or commitment). Given the small number of youth that receive a sanction of secure confinement, when explanatory variables are added to the model (for example they are 12 African Americans that received either detention or commitment) the generalizability of any findings is extremely tentative.

### **Data Analysis**

This section describes the working data set. The total of 28,071 cases represents all juveniles arrested or referred to CYFD in FY07 – FY09 as described in the data section above. Table 1 reports referral charges, referral severity, gender, and race/ethnicity.

Property Misdemeanor/Petty Misdemeanor (M/PM) crimes accounted for 23.6% of all crimes, followed by Public Order M/PM (20.8%), Person M/PM (13.9%),

Table 1 – Referral Charges/Severity, Gender, and Race						
Variables		Count	%			
Charges and Severity	Rank					
Person Felony	10	1,265	4.5%			
Weapon Charge	9	928	3.3%			
Drug Charge Felony	8	471	1.7%			
Property Felony	7	1,659	5.9%			
Person M/PM	6	3,891	13.9%			
Drug Charge M/PM	5	3,451	12.3%			
Property M/PM	4	6,624	23.6%			
DWI (w/other)	3	688	2.5%			
Poss. Alcohol M/PM	2	3,243	11.6%			
Public Order M/PM	1	5,851	20.8%			
Total		28,071	100.0%			
Gender						
Male		17,709	63.1%			
Female		10,362	36.9%			
Race						
Non-Hispanic White		8,054	28.7%			
Hispanic		17,350	61.8%			
African American		706	2.5%			
Native American		1,961	7.0%			
Total		28,071	100.0%			

Drug Charges M/PM (12.3%), and Possession of Alcohol M/PM (11.6%). Felony charge types (Person, Weapon, Drug, and Property) accounted for 15.4% of all charges.

Table 2 – Delinquent Priors, FINS Priors and Age						
Variables	Ν	Mean	Std. Dev			
Delinquent Priors						
Referred to CCA	5,631	2.2	1.9			
Handled Informally	9,507	1.6	0.9			
FINS Priors						
Handled Informally	1,589	1.3	0.7			
Age						
Juveniles aged 10-21	28,071	15.4	1.7			

Males accounted for 63.1% of the sample. Hispanics accounted for the majority of cases (61.8%) followed by Non-Hispanic Whites (28.7%), Native Americans (7%), and African American (2.5%).

The number, range, mean and standard deviation for delinquent priors and age (the continuous dependent variables) are presented in Table 2. Delinquent priors are split into two categories based on how they were handled: referred to CCA or informal recommendations. These categories are not mutually exclusive, and individuals can have both referrals that were referred to the CCA and referrals that were handled informally. In total, 41.2% of the study sample had a prior delinquent offense. Nearly 34% of the study sample had a delinquent offense that had been handled informally (average 1.6) and 20% had a delinquent offense that had been referred to the CCA (average 2.2). Average age of study group members was 15.4 years of age.

Table 3 reports the distribution of race/ethnicity by contact point as reflected in the working data set.

Table 3 – Race Distribution for each Contact Point										
Race	Tot	al	Non-Hispa	anic White	Hisp	anic	African-A	merican	Native-A	merican
Contact Points	Count	%	Count	%	Count	%	Count	%	Count	%
State Population	298,623	100.0%	92,778	31.1%	161,951	54.2%	10,151	3.4%	33,743	11.3%
Arrests	28,071	100.0%	8,054	100.0%	17,350	100.0%	706	100.0%	1,961	100.0%
Refer to CCA	7,904	28.2%	2,201	27.3%	4,873	28.1%	264	37.4%	566	28.9%
Diversion (Informal)	20,167	71.8%	5,853	72.7%	12,477	71.9%	442	62.6%	1,395	71.1%
Secure Detention										
Petitioned	4,651	100.0%	1,243	100.0%	2,858	100.0%	159	100.0%	391	100.0%
Dismissed/Nolle Prosequi	1,307	28.1%	380	30.6%	741	25.9%	53	33.3%	133	34.0%
Delinquent Findings	3,344	71.9%	863	69.4%	2,117	74.1%	106	66.7%	258	66.0%
Sanctions Percentages total to Delinquent Findings and are Relative to Petitions Filed										
Time Waiver/Consent										
Decree	2,413	51.9%	663	53.3%	1,549	54.2%	77	48.4%	124	31.7%
Probation	650	14.0%	152	12.2%	391	13.7%	17	10.7%	90	23.0%
Detention	169	3.6%	31	2.5%	102	3.6%	4	2.5%	32	8.2%
Confinement	112	2.4%	17	1.4%	75	2.6%	8	5.0%	12	3.1%
Transferred to Adult Court										

## **RESULTS/FINDINGS**

Logistic regression has been used in previous studies exploring causes of DMC (Bishop et al, 1996 and Keaton et al, 2008) and is one of the suggested quantitative methods in Leiber et al 2009. It was chosen as an analytical tool in this study because it is an efficient method to study the causes of DMC. When a race category compared to Non-Hispanic White is significant and greater than one, DMC (for overrepresentation) can be inferred. Odds ratios are a relatively understandable and common method used to interpret the regression results. Interpretation of the direction and magnitude of the effect per variable is relatively straight forward enabling the testing of plausible explanations of DMC while incorporating theoretical considerations.

# Contact Point One: Referral to the Children's Court Attorney

The estimated odds ratios for this model are presented in Table 4, column headed "Model I". The 10 crime category/severity variables are divided into two categories; the more serious felony offenses and less serious misdemeanors/petty misdemeanors (M/PM). All 10 crime categories are significant, supporting that they have an effect on whether or not a juvenile is referred to the CCA. The odds ratios for categorical variables are interpreted in the following way: they have a positive effect if greater than one, in this contact point meaning the odds of the event (referral to the CCA) increase. For these variables, we are measuring the odds of referral to CCA for those having that particular charge relative to those who do not have that particular charge:

# Differential offending, history and risk factors

- The probability of a juvenile being referred to the CCA with a felony offense is significantly greater than if they were not charged with that particular offense. It ranges from six times greater (weapon charge) to 43 times (felony person charge).
- The direction of the effect of M/PM offenses is in the opposite direction (as expected), and is interpreted in the following way. A juvenile with a PM/M effect is less likely to be referred to the CCA. For those offenses with an estimated ratio of 0.1 they are about 10 times less likely to be referred to the CCA. Similarly, for misdemeanor person offenses juveniles are 5 times less likely to be referred to the CCA. While DWI (w/other) are 2 times less likely to be referred to the CCA.

The interpretation of log ratios differs for variables which are or continuous or measurement variables: an

estimated ratio close to one implies very little or no difference. When interpreting: the difference from one is considered the effect and it is expressed in percentage terms.

- For those with a history of priors treated informally the estimated odds of being referred to the CCA increase by 40% for each additional prior.
- The estimated odds of referral to CCA is approximately 70% for each additional prior treated formally.
- FINS priors are a proxy for other contacts with CYFD (an effort to test for indirect effects). The odds of referral to the CCA increase 30% for each FINS prior.

## **Demographics**

Race/Ethnicity is significant in the model. The estimated ratios measure the odds of referral for each race group (minority) relative to White Non-Hispanic.

- The odds of referral to CCA for a African-American juvenile are greater than a White Non-Hispanic juvenile, though close to one. At 1.3, the probability of a African-American juvenile being referred to the CCA is slightly higher relative to a White Non-Hispanic juvenile.
- Alternatively, the odds of referral to CCA are slightly less for a Hispanic as compared to a White Non-Hispanic juvenile. The estimate is highly significant, though very close to one indicating that the difference is not substantive.
- Native American is not significant at this contact point.
- Age and gender are significant. The estimated odds ratio rounds to one for age meaning there is really no difference in probability of being referred to CCA for a year increase in age.
- The ratio for gender is also close to one. At 1.3; the probability of males being referred to the CCA is slightly higher than females.

### Region

CYFD region is significant. The estimated ratios measure the odds of referral for each region relative to Region 3, Bernalillo and Valencia counties (see Figure 10 on page 9 for a map of the regions).

- The odds of referral to CCA for a juvenile in Region 1 (Northwestern NM) are greater than Region 3, though close to one. At 1.2, the probability of a juvenile in Region 1 being referred to the CCA is slightly higher relative to Region 3.
- The odds of referral to CCA for a juvenile in Region 5 (Southwestern and South Central NM) are

Table 4					
Effect of Explanatory	Variables on the the	Model I	Model II		
Probability of a Juvenile Moving Further into		Refer	Petition Outcome		
the System: Logistic	Regression Results for	To CCA			
Three Con	tact Points	R <sup>2</sup> = 0.67	R <sup>2</sup> = 0.72		
		Estimated	Estimated		
Variable	Reference	Odds Ratio	Odds Ratio		
Rank of referral charges	(Model II)				
Misdeamor	Vs Felony		0.9 *		
Categories of referral ch	arges that are felonies				
(Fel.)					
Fel. Personal Crime	Vs. No	43.5 ****			
Fel. Weapon	Vs. No	6.1 ****			
Fel. Drug	Vs. No	27.7 ****			
Fel. Property Crime	Vs. No	34.0 ****			
Categories of referral ch	arges that are mis-				
demeanors or petty misc	demeanors (M/PM)				
M/PM Personal Crime	Vs. No	0.2 ****			
M/PM Drug	Vs. No	0.1 ****			
M/PM Property Crime	Vs. No	0.1 ****			
M/PM DWI (w/other)	Vs. No	0.5 ****			
M/PM Poss. Alcohol	Vs. No	0.1 ****			
M/PM Public Order	Vs. No	0.1 ****			
More Frequent Involvem	ent (Delinquent Priors)		4.0.4444		
I reated Informally		1.4 ****	1.2 ****		
I reated Formally		1./ ****	1.3 ****		
History of Status Offense	es (Status Priors)	1 0 1111			
I reated Informally		1.3 ****			
Region	N D : 0	4.0 ****	4 0 ****		
Region 1	Vs Region 3	1.2 ****	1.0 ****		
Region 2	Vs Region 3	1.1 **	1.0 ***		
Region 4	Vs Region 3	1.1 ***	1.9 ****		
Region 5	Vs Region 3	U./ ****	2.0 ****		
Race/Ethnicity		4 ~ ***	4.4		
African American	VS. White	1.3 ^^^	1.1		
Ivalive American	VS. White	1.0	2.1 ***		
Hispanic	vs. white	0.9 ***	1.1 **		
Age at Referral		4 0 ***	0.0 ****		
Age (single years)		1.0 ***	0.8		
Genaer	Ve Female	1.0 ****	1.0 ***		
IVIAIE	vs. Female	1.3 ^^^^	1.2 ***		

\*P< 0.1, \*\*p<0.05, \*\*\*p<0.01, \*\*\*\*p<.0001

less than Region 3 though close to one. At 0.7, the probability of a juvenile in Region 5 being referred to the CCA is slightly lower relative to Region 3.

• The odds ratios for Region 2 and Region 4 are statistically significant, however they are very close to one indicating that the differences are not substantive.

# Contact Points Two and Three: Petition Outcomes

The petition outcome comprises contact point two (delinquency finding) and contact point three (sanction) simultaneously. The estimated odds ratios are presented

# Demographics

- Native Americans are 2 times *more* likely than Non -Hispanic White juveniles to receive a sanction of commitment.
- This finding is statistically significant, however the number of youth with a sanction of commitment is low. Not controlling for other variables, 3.1% of Native American juveniles and 1.4% Non-Hispanic White juveniles who were found delinquent received a sanction of commitment (Table 3 page 6).

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in Table 4, column labeled "Model II". The odds in Model II are proportional, meaning they are interpreted as the odds of commitment versus the combined odds of dismissed, time waiver/consent decree, probation, and detention given that all other variables are held constant.

# Differential offending, history and risk factors

- A juvenile is less likely to get a sanction of commitment if their most serious petition charge is a misdemeanor. The odds of commitment is 0.9 times lower.
- Juveniles with prior referrals that were handled informally are more likely to receive a sanction of commitment. For each additional prior informal referral, the odds of getting a sanction of commitment goes up 20%.
- Juveniles with prior referrals that were handled formally are more likely to get a sanction of commitment. For each additional prior formal referral, the odds of receiving a sanction of commitment goes up 30%.
- Juveniles with prior FINS referrals are more likely to get a sanction of commitment. For each additional prior FINS referral, the odds of receiving a sanction of commitment goes up 30%.

- Hispanic juveniles are slightly more likely than Non-Hispanic White juveniles to receive a sanction of commitment. Although the difference is statistically significant, since the odds ratio is very close to one the difference is not substantive.
- Both age and gender are statistically significant, however since the odds ratios are very close to one the differences is not substantive.

#### Region

- Juveniles in Region 4 are nearly 2 times *more* likely than juveniles in Region 3 to receive a sanction of commitment.
- Juveniles in Region 5 are 2 times *more* likely than juveniles in Region 3.
- The odds ratios for Region 1 and 2 are statistically significant, however they round to one indicating that the difference is not substantive.

# LIMITATIONS OF MODEL II

As mentioned in the model components section, the primary reason for using a combined model is the lack of variation in the dependent variable at the sanction stage. Given the small number of youth within some of the petition outcome categories (particularly commitment), when explanatory variables are added to Model II, the generalizability of these findings may become compromised. To better understand and explain the possible effect of small sub-groups on Model II, some simple bi-variate graphs (Figures 11-12) were created using the data from Table 3 and the model predicted probabilities of the five petition outcomes by race were graphed relative to age, prior referrals to the CCA and prior referrals handled informally.

## **Regional Differences in Outcomes**

There is evidence that the odds of receiving a sanction of commitment for Region 4 and Region 5 were higher compared to Region 3. Figure 10 is the CYFD region map and is included for reference purposes. Figure 11 is a stacked bar chart that compares the relative percentages of the petition outcomes by region. Looking at the relative size of each petition outcome color across the regions, different patterns emerge. Not controlling for other variables, Region 4 has a commitment percentage of 3.1% while Region 5 has a commitment percentage of 2.8%, and Region 3, the reference for the comparison, has a commitment percentage of 1.6%. While the percentage differences for Region 4 and Region 5 compared to Region 3 seem small, when all other variables are held constant the model shows that the odds of commitment is higher for each region individually when compared to Region 3.





# **Differences in Outcome By Race/Ethnicity**

Native Americans were more likely to receive a sanction of commitment compared to Non-Hispanic Whites. Figure 12 is a stacked bar chart, not controlling for other variables, that compares the relative percentages of the petition outcomes by race. Looking at the relative size of each petition outcome color across the race categories, different patterns emerge. Just over 3% of Native American juveniles and 1.4% Non-Hispanic White juveniles who were found delinquent received a sanction of commitment. In Model II, Native Americans are 2 times *more* likely than Non-Hispanic White juveniles to receive a sanction of commitment, but the number of youth with this sanction in these race/ ethnicity categories is small, 29.

The actual percentage of African American youth who received a sanction of commitment is actually higher than any other race category (5.0% compared to 1.4% for Non-Hispanic White Non-Hispanic youth). However the odds of receiving a sanction of commitment for African American youth is not statistically different relative to Non-Hispanic White youth. Sub-group size is a potential concern since there were only 112 youth that received a commitment sanction and only 8 were African American.

When petition outcome is looked at in cross-tabulations that include both region and race, it becomes clear that in some cases the effect of race in the model is confined to a single region. The most pronounced instance is Native American juveniles that receive a detention or commitment. Thirty-six of the 44 Native American with these petition outcomes are in Region 1. Moreover 71.1% of the Native Americans in the sample are in Region 1.

The most stable variables throughout our analysis are the indicators of prior referrals and age. To illustrate this point we mapped the predicted probabilities by petition outcome and race against age, the number of prior informal referrals, and the number of prior referrals referred to CCA. These graphs hold all other variables constant. The Y-axis is the predicted percentage expressed in decimal format (for example .20 represents 20%). These graphs illustrate that the predicted percentages for Non-Hispanic White, African-American, and Hispanic are very similar for each petition outcome. For all the race categories the general shape of the predicted probabilities is similar indicating that an increase in prior informal referrals, prior referrals referred to CCA, and age has similar effects when all other variables are held constant. The predicted probability for dismissal and time waiver/ consent decree decreases as these variables increase, and the predicted probability of judge ordered probation, detention, and commitment increases as these variables increases.

The Native American predicted probability trend is different than all other categories, but the actual percentage difference is relatively small. The problem with making any inference about the treatment of Native Americans in New Mexico from this model is that as indicated above the vast majority of the Native Americans are in a single region. Additionally, the lower predicted probability of a time waiver/consent decree compared to judge ordered probation for Native Americans may represent a difference in case processing in Region 1 compared to the rest of the state. Figures 13-15 (page 12) lists the predicted probabilities



by petition outcome and race against age, the number of prior informal referrals, and the number of prior referrals referred to CCA.

# CONCLUSION AND ADDITIONAL RESEARCH

After the initial arrest/referral the JPO makes a decision of whether or not to move the juvenile further into the system via referral to the CCA. Model I results show differential offending (referral charge and offending history) play a large role in this decision. By looking at separate charge categories, one can see the effects each has on the decision. Looking at prior history, a history of priors referred to the CCA, priors treated informally and FINS priors all increase the odds of being referred to the CCA. Race also plays a role. It is important to note that even when prior history and differential offending are accounted for in the model; race is statistically significant indicating the presence of DMC. African American youth are more likely to be referred to the CCA relative to Non-Hispanic White Non-Hispanic youth.

# **Differential Offending as a Mechanism**

There is evidence that all offending history and charge categories are correlated to race. Therefore, differential offending can be a mechanism for DMC. This is a preliminary finding for two reasons: First, the race effect is moderate. Second, the correlation between race, offense severity and history *may have originated at the arrest point*. To clarify this relationship it would

be useful to further study this particular mechanism with interviews and perhaps focus groups of JPO officers and administrators.

# Other CYFD Contacts as a Mechanism

FINS referrals represent instances where a child or family has refused family services or CYFD has exhausted appropriate and available family services and court intervention is necessary to provide family services in situations of truancy and runaways. The effect is modest and significant. It is important to note that this only represents an indirect measure of risk factors, one component of the mechanism of interest, *indirect effects*. It was included in the analysis as a proxy only and not believed to be indicative of all possible risk factors. It is exploratory; and further research is warranted, which will be elaborated on below in the further research section.

#### **Additional Research**

The results from our models show some evidence of DMC. Mechanisms of DMC are important to explore in order to help inform policy and help design appropriate DMC reduction strategies and programs. Recommendations regarding the need for further research are presented in this section which serve to; solidify the findings, and add information regarding mechanisms illuminated in this assessment and provide the opportunity to more completely explain DMC in the N.M. juvenile justice system by exploring other mechanisms.

### Differential Offending

Both differential offending factors (offenses as well as histories) are potential mechanisms. It would be useful to augment the current dataset and analysis with variables regarding gang-related involvement. It would also be useful to conduct interviews and/or focus groups with a random sample of the decision makers at this particular juncture in the N.M. juvenile justice system to understand which factors falling under the definition of this particular mechanism help shape their decision.

#### Indirect Effects

Indirect effects can be embedded in race if their incidence more likely to occur in minority youth. The data available is the counts of FINS referrals which were treated informally. This variable was significant in both models. This potential mechanism deserves further exploration, and we could drill down deeper either through data augmentation, or personal interviews. It would be interesting to look at some or all of the following; economic status, neighborhood composition, family structure and school performance. There also may be a difference in access to behavioral health and substance abuse programs. In addition, the SARA data mentioned above includes a risk assessment tool which may prove to be a better proxy for risk factors than the one included in the models.

### Accumulated Disadvantage

There does not appear to be support for accumulated disadvantage. One method to solidify those results and explore the presence *accumulated disadvantage* is to explore the pre-adjudicatory detention contact point in the process. The mechanism addresses the fact that decisions made at earlier stages have an impact or help shape outcome decisions at later stages which put minorities at a disadvantage. Detention can be a catalyst for, and therefore a predictor of more serious outcomes at later stages in the process. This would require the SARA data which contains detention information.

# Differential Processing or Inappropriate Decision Making Criteria

This mechanism addresses the decision making process with respect to selection of diversion programs or selecting alternative decision outcomes; if they are structured so as to place minorities at a disadvantage, and if not, are application criteria consistent across races. There does not appear to be evidence of differential processing or inappropriate decision making

criteria, however adding a qualitative method would provide additional information on this mechanism.

#### Mobility Effects/Justice by Geography

Geography related mechanisms (mobility effects and justice by geography) were not addressed as this is a statewide analysis. The use of the CYFD regions is not sufficient to be used as a measure of this mechanism although it does show differences in racial/ethnicity compositional when the state is broken down into subgroups. Analysis of this mechanism could be approached with additional analysis for sufficiently large geographical areas, for example metropolitan statistical areas (MSA). Additionally, this could be done using larger counties, however given the sample sizes observed in this study the time period would need to be over three years.

# **OTHER STATE ASSESSMENT FINDINGS**

The complete *State of New Mexico Disproportionate Minority Contact Statewide Assessment: Preliminary Report* contains a full literature reviews and bibliography. There have been numerous studies that have shown there are substantial differences in the processing of minority youth within many juvenile justice systems (Pope and Feyerherm, 1989). The majority of these studies have reviewed RRIs to assess where DMC exists in their juvenile justice systems and to report these differences. A variety of methods have been used to study the causes of DMC including quantitative and qualitative methods or a combination of the two. Our assessment focuses on quantitative methods primarily using logistic regression to measure the causes as a number of contact points.

#### METHODOLOGY

The complete State of New Mexico Disproportionate Minority Contact Statewide Assessment: Preliminary *Report* contains a complete description of the methodology used in this study. Logistic Regression is used as the multivariate analytical technique because it is an appropriate technique for analyzing the effects of a set of independent variables on a dichotomous dependent variable. This analytical method is widely used in research to address questions where the phenomena (such as a youth penetrating further into the system at a given point) to be explored is dependent upon one or more factors and it is expressed in terms of yes or no (a dichotomy) dependent variable. This analytical technique allows the development of a model of those explanatory variables that best profile and predict the occurrence of the event in terms of probability. In addition, it allows inclusion of a set of independent variables of mixed types. For categorical variables such as race, it allows comparison of minorities to Non-Hispanic White (the reference). The effects of continuous or count variables such as age or number of priors can also be used within the same model. Of utmost importance, it provides a tool with which to look at race effects while holding other variables constant that can be used to measure mechanisms, such as differential offending, thereby deciphering the causes of minority over-representation at the chosen decision points in the system. Ordered logistic regression is a viable method when the dependent variable is not dichotomous and represents a ranking of categories as in Model II.

Figure 13: Predicted Probabilities for 5 Outcomes As Age Increases By White, Native American, Black, and Hispanic



Figure 14: Predicted Probabilities for 5 Outcomes As Delinquent Informal Incrs By White, Native American, Black, and Hispanic



