



**COMMITMENTS/RELEASES FROM
ADJC SECURE CUSTODY BY
RACE/ETHNICITY**

Submitted to

Minority Over Representation Group

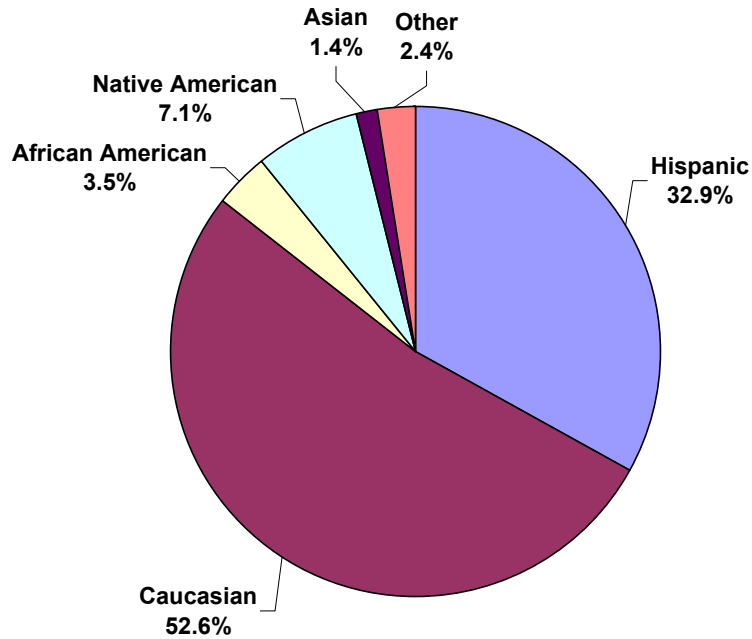
**Research and Development
December 18, 2002**

EXECUTIVE SUMMARY

On October 13, 2000 the Research and Development Section (R/D) submitted a report entitled *Commitments/Releases from ADJC Secure Custody by Race* to the Minority Over Representation Group (MOR). At the June 20, 2002 MOR meeting a request was made to R/D to update certain items of interest contained in the original report. This updated report includes the items of interest specified by the MOR and it provides a simple yet dynamic picture of this important issue by displaying data for 2000, 2001 and 2002. Key findings of this research endeavor include the following:

- More than one-half (52.6%) of Arizona juveniles between the ages of 10 and 17 are Caucasian and the second largest race/ethnicity is Hispanic representing almost one third (32.9%) of the total. Native American and African American juveniles together comprise 10.6% of the population with the remaining races accounting for 3.8% of the total.
- The largest number of ADJC commitments were Hispanic, followed by Caucasian, African American, Native Americans, Mexican Nationals and Asians.
- The proportion of Hispanic, Mexican National and Asian commitments has remained stable. Meanwhile, the proportion of African American commitments increased (+2%) and the proportion of Caucasians decreased (-3%).
- A greater proportion of minorities than Caucasians were denied at Superintendent Release Boards (SRB).
- Hispanics comprised the largest proportion of SRB denials, followed by Caucasians and African Americans.
- Minorities had higher SRB denial rates than Caucasians. Among minorities, African Americans had the highest denial rates, followed by Mexican Nationals, Native Americans and Hispanics.
- Holding risk score constant, African Americans were 46% more likely, Hispanics were 10% more likely and other minorities were 28% more likely than Caucasians to be denied by a SRB. Other important correlates of SRB denial were gender, violent and sex offenders, sexual abuse, special education and mental health issues.
- Hispanics and African Americans had their paroles suspended at levels higher than would be expected and Caucasians had their paroles suspended at lower levels.
- Hispanics and African Americans had their paroles revoked at levels higher than would be expected; Caucasians and Mexican Nationals had their paroles revoked at lower levels than expected.

ARIZONA JUVENILES AGES 10 TO 17¹



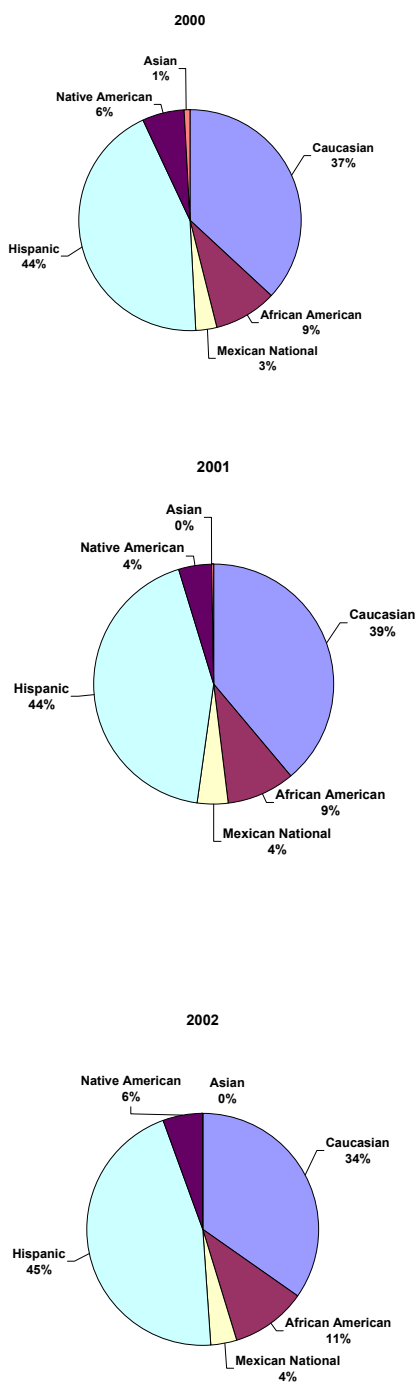
Race/Ethnicity	Number	Percentage
Hispanic	195,937	32.9%
Caucasian*	312,591	52.6%
African American*	20,926	3.5%
Native American*	42,256	7.1%
Asian*	8,578	1.4%
Other*	14,404	2.4%
Total	594,692	100%

* Non-Hispanic

- More than one-half (52.6%) of Arizona juveniles between the ages of 10 and 17 are Caucasian and the second largest race/ethnicity is Hispanic representing almost one third (32.9%) of the total. Native American and African American juveniles together comprise 10.6% of the population with the remaining races accounting for 3.8% of the total.

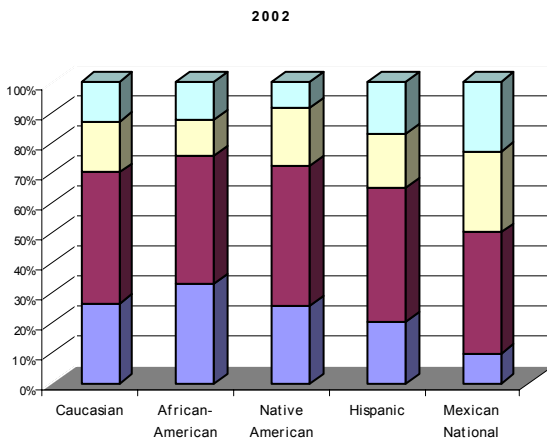
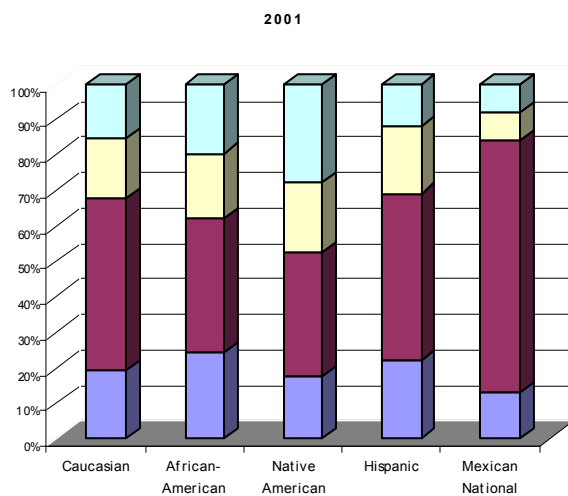
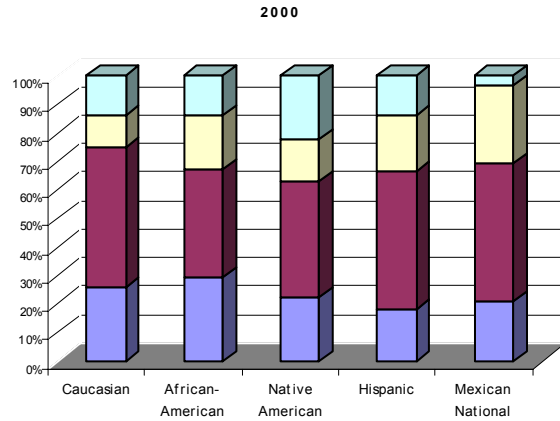
¹ Source: the Department of Economic Security, Population Statistics Unit

ADJC COMMITMENTS



- The largest number of ADJC commitments were Hispanic, followed by Caucasian, African American, Native Americans, Mexican Nationals and Asians.
- The proportion of Hispanic, Mexican National and Asian commitments remained stable. Meanwhile, the proportion of African American commitments increased (+2%) while the proportion of Caucasians decreased (-3%).
- Among males, the proportion of Hispanic or Mexican National commitments increased by 3% while the proportion of Caucasians decreased by 2.4% (not shown). The other racial/ethnic categories experienced minor changes.
- Among females, Native Americans increased by 4.7% with the other racial/ethnic categories experiencing only minor changes (not shown).

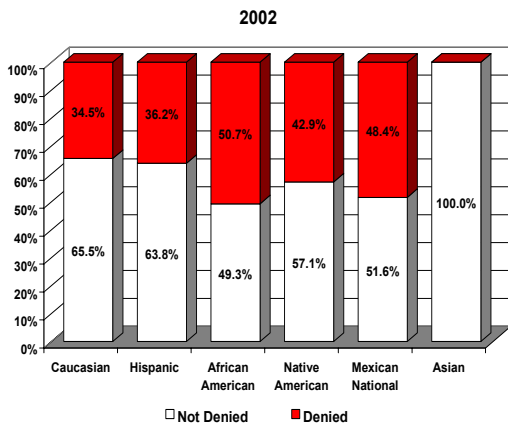
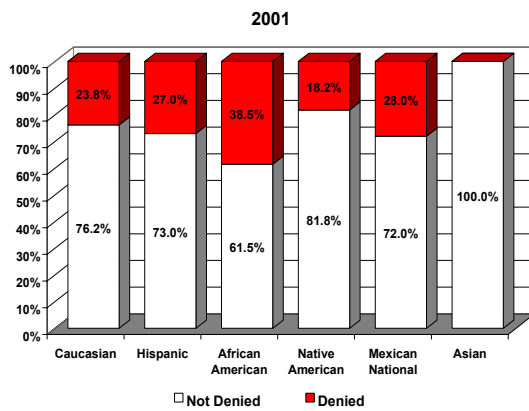
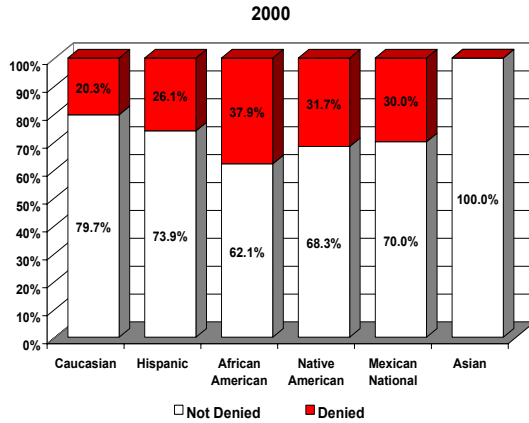
ADJC COMMITMENTS BY OFFENSE TYPE



■ violent
 ■ property
 ■ drug
 ■ other

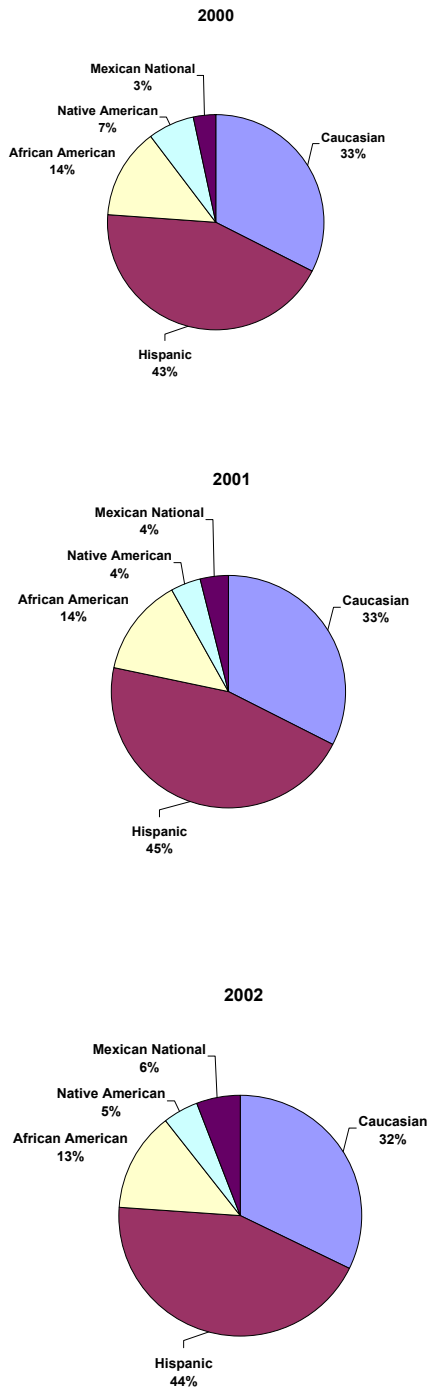
- Property offenses were the most common ADJC commitment category followed by violent, drug and others.
- No one race/ethnicity consistently had the highest proportion of property offenders.
- African Americans had the highest proportion of violent offenders for all three years.
- Mexican Nationals had the highest proportion of drug offenders in two of the three years.
- Native Americans had the highest proportion of “other” offenders in two of the three years.
- ADJC commitments received more time for violent offenses followed by property, drug and other offenses.
- Caucasian commitments tended to receive the longest time for violent offenses and Hispanics received the longest time for property offenses. There was no racial/ethnic pattern for drug offenses, however, Native Americans tended to receive the longest time for other offenses.

SUPERINTENDENT RELEASE BOARD RESULTS BY YEAR AND RACE



- A greater proportion of minorities than Caucasians were denied at Superintendent Release Boards (SRB).
- A greater proportion of juveniles were denied at SRBs in 2002 than in the previous two years.
- Among Caucasians and Hispanics, males were denied more often than females (not shown). Among African Americans, Mexican Nationals and Native Americans, females were denied more often than males. Too few Asians appeared before SRBs to make definitive statements on denial by gender.

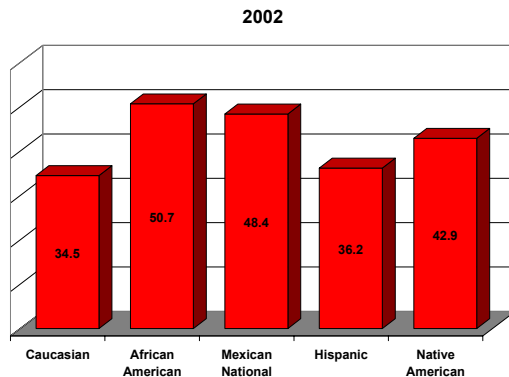
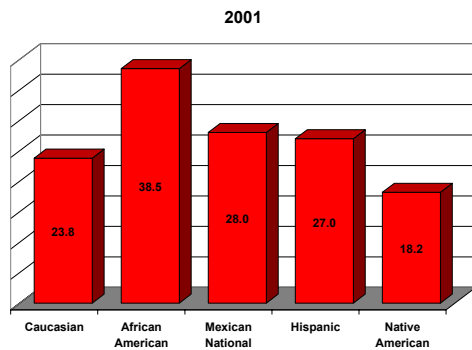
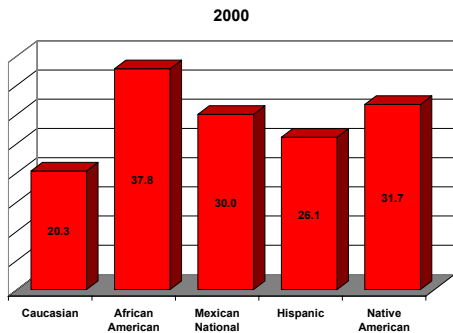
JUVENILES DENIED AT SUPERINTENDENT RELEASE BOARDS



- Hispanics comprised the largest proportion of SRB denials, followed by Caucasians and African Americans. Native Americans and Mexican Nationals comprised approximately 10% of the denials.
- There was virtually no annual variation in the proportion of SRB denials by the five largest racial groupings.
- While the number of females denied at SRB hearings remained constant at about 24 for the three years examined (not shown), the proportion of females that were denied who were African American dramatically increased from 4% in 2000 to 21% in 2001 and to 30% in 2002.
- Almost one-half (46%) of the SRB denials were committed to ADJC on property offenses and approximately one quarter (28.3%) were committed for crimes against persons (not shown). The remaining SRB denials were committed for public order (12.8%), drugs (9.6%), weapons (1.6%) or other offenses (1.6%).

SUPERINTENDENT RELEASE BOARD DENIAL RATES

(per 100 juveniles of the same race/ethnicity that appeared before a SRB)



- Minorities had higher SRB denial rates than Caucasians. Among minorities, African Americans had the highest denial rates, followed by Mexican Nationals, Native Americans and Hispanics.
- SRB denial rates increased each year from 2000 through 2002.
- Among males, Mexican Nationals experienced the largest increase in SRB denial rates (from 29.4 to 51.7). Among females, both African Americans (from 16.6 to 63.6) and Hispanics (from 23.8 to 30.3) experienced large increases in the SRB denial rates (not shown).

LOGISTIC REGRESSION ANALYSIS OF SRB DENIALS

Logistic regression is a popular statistic in criminology, and we used it to help clarify the nature of the relationship among the factors relevant to SRB decision making. There were at least three key findings from this statistical endeavor. First, it confirmed our previous findings insofar as minorities were found to be more likely to be denied at SRBs than Caucasians. Indeed, African American males were 84% more likely, Hispanic males were 24% more likely and other minority males were 32% more likely than Caucasian males to be denied. Moreover, African American females were 93% more likely, Hispanic females 25% more likely and other minority females were 34% more likely than Caucasian females to be denied. Second, when we interviewed staff serving on SRBs we learned that risk score was an important consideration to them, therefore we included it into our statistical analysis. Holding risk score constant, we found that African Americans were 46% more likely, Hispanics were 10% more likely and other minorities were 28% more likely than Caucasians to be denied. Third, controlling for the influence of all other factors upon SRB denials, we also obtained the following results:

- a) **Gender:** males were 48% more likely than females to be denied.
- b) **Violent offenders:** juveniles with violent behavior in their background were 40% more likely to be denied than those without it.
- c) **Sexual abuse:** juveniles with family sexual abuse in their background were 34% more likely to be denied than those that had not been sexually abused.
- d) **Sex offenders:** juveniles with inappropriate sexual behaviors in their background were 22% more likely to be denied than those without these behaviors.
- e) **Special education:** juveniles with intellectual/educational deficits were 22% more likely to be denied than those without these deficits.
- f) **Mental health:** juveniles with emotional stability issues were 18% more likely to be denied than those without these issues.

Given below is a description of variables and their measurement.

RISKSCO: Risk score of the juveniles.

AFAM: If African-American, then AFAM=1, elsewhere 0.

HISP: If Hispanic HISP=1, elsewhere 0.

OTHER: If other minorities other than African-American and Hispanic OTHER=1,
Elsewhere=0.

GENDER: If Male GENDER=1, if female GENDER=0.

SEXBEH: If sexual behavior is inappropriate SEXBEH=1, or else SEXBEH=0.

VIOBEH: If a juvenile is prone to violence VIOBEH=1, or else VIOBEH=0.

EMOTSTSA: If a juvenile is emotionally unstable, EMOTSTA=1, or else EMOTSTA=0.

INTEDU: If a juvenile is intellectually/educationally deficient, then INTEDU=1,
or else INTEDU=0.

FASEXAB: If a juvenile had been sexually abused by other family members,

FASEXAB=1, or else FASEXAB=0.

TABLE 1 LOGISTIC REGRESSION EQUATIONS		
VARIABLES	EQUATION-1 (t-RATIOS)	EQUATION-2 (t-RATIOS)
CONSTANT	-2.10 (-9.37)	-1.88 (-8.61)
RISKSCO		-0.03 (-1.02)
AFAM*RISKSCO		0.17 (4.08)
HISP*RISKSCO		0.04 (1.46)
OTHER*RISKSCO		0.11 (2.52)
AFAM	0.79 (4.73)	
HISP	0.26 (2.36)	
OTHER	0.34 (1.96)	
GENDER	0.48 (2.93)	0.46 (2.80)
SEXBEH	0.28 (2.05)	0.26 (1.85)
VIOBEH	0.46 (3.32)	0.44 (3.12)
EMOTSTA	0.23 (2.14)	0.21 (1.94)
INTEDU	0.22 (2.14)	0.25 (2.36)
FASEXAB	0.40 (1.67)	(0.38) (1.59)
LIKELHOOD RATIO	61.20	58.41

The dependent variable for the above equations is the odds ratio of being denied by SRB the first time to not being denied by SRB the first time.

The estimated logistic regression equations are given in table 1. Equation-1, as a whole, does a reasonable job of explaining the odds ratio of being denied to not being denied, since the likelihood ratio is statistically significant at the 5% level. Now turning to individual coefficients, all of them are statistically significant at the 5% level. The noteworthy feature of the equation is that the coefficients associated with the binary variables for race AFAM, HISP and OTHER are not only highly statistically significant but have a large impact on the SRB denial rate as can be seen by the magnitude of the coefficients.

TABLE 2 PROBABILTY OF FIRST SRB DENIAL FOR DIFFERENT RACES				
RACE	MALES		FEMALES	
	PROBABILITY	% CHANGE	PROBABILITY	% CHANGE
Caucasian	0.165		0.110	
African-American	0.304	84.2	0.212	92.7
Hispanic	0.204	23.6	0.137	24.5
Other Minorities	0.218	32.12	0.147	33.6

Table 2 calculates the probability of first denial by SRB for various races for males and females. The chances of first denial by African-American males are 84 % more than Caucasians males while African-American females are 93% more likely to be denied than their Caucasian counterparts. Hispanic males have 24% more probability of being denied the first time than Caucasian males while Hispanic females are 25% more likely to be denied than Caucasian females. Minorities other than African-Americans and Hispanics are 32% more likely than Caucasians to be denied the first time; the other minority females are 34% more likely to be denied than Caucasian females.

While the above analysis leaves no room for doubt about the existence and extent minority overrepresentation, it would be instructive to examine the role played by risk factors in the perpetuation of minority overrepresentation. Equation 2, given in table 1, estimates the differential role played by risk score for the different races in the SRB decision making. The variables AFAM*RISKSCO, HISP*RISKSCO and OTHER*RISKSCO enable us to calculate the differential impact of risk score for the different racial groups. The likelihood ratio is significant at the 5% level indicating that the equation does a good job of explaining the variation in the odds ratio of being denied to not being denied. All the coefficients except for those for RISKSCO and HISP*RISKSCO are statistically significant at the 5% level. Since the coefficient for HISP*RISKSCO is significant at the 7% level, it is retained for further analysis.

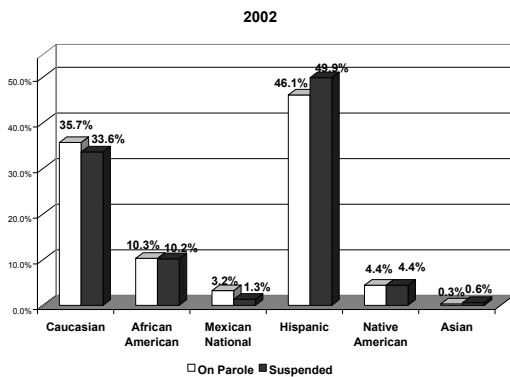
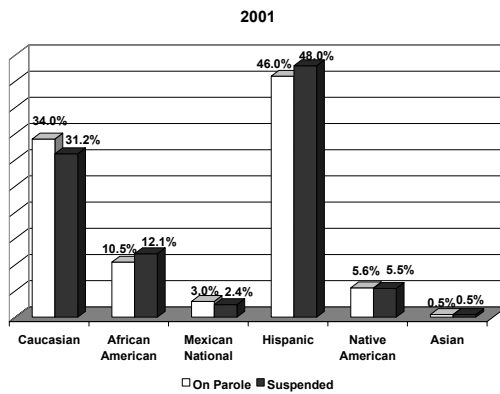
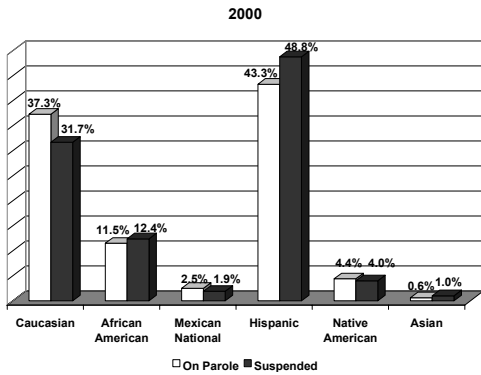
Table 3 calculates the differential effect on SRB decision making for the same risk score of 3 across all racial groups. African-American are 46% more likely than Caucasians to be denied at their first appearance before the SRB while the corresponding figures for Hispanic and other minority races are 10% and 28% respectively. Please note that the probabilities here are obtained after controlling for other factors. Therefore these should be interpreted as the role played solely by the risk score towards minority overrepresentation. To be sure, there are other factors contributing to disproportionate representation of minorities. Let us now direct our attention to them.

TABLE 3 PROBABILITY OF FIRST SRB DENIAL BASED ON RISK SCORE		
RACES	PROBABILITY	% CHANGE
Caucasian	0.195	
African-American	0.285	46.2
Hispanic	0.215	10.3
Other Minority Races	0.250	28.2

TABLE 4	
% INCREASE IN PROBABILITY OF FIRST SRB DENIAL DUE OTHER FACTORS	
FACTORS	% INCREASE
MALE	47.7
INAPPROPRIATE SEXUAL BEHAVIOR	22.1
VIOLENT BEHAVIOR	40.0
EMOTIONAL INSTABILITY	17.8
INTELLECTUAL/EDUCATIONAL DEFICITS	21.5
FAMILY SEXUAL ABUSE	33.8

The other factors responsible for SRB denials, according to equations 1 and 2, are gender, inappropriate sexual behavior, violent behavior, emotional instability, intellectual and educational deficit and family sexual abuse. Table 4 below calculates the increase in the chance of being denied due to the other factors that influence SRB decision making. For example, male juveniles have a 48% increase in being denied over females while inappropriate sexual behavior increases the probability of being denied by 22%. A similar interpretation applies to the rest of the other factors.

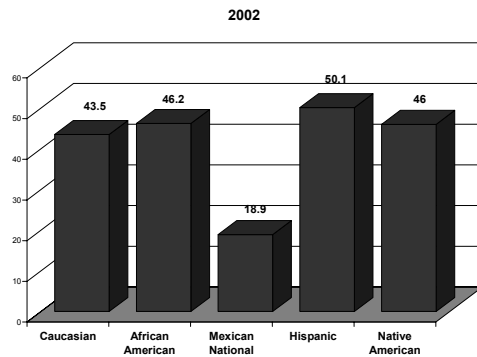
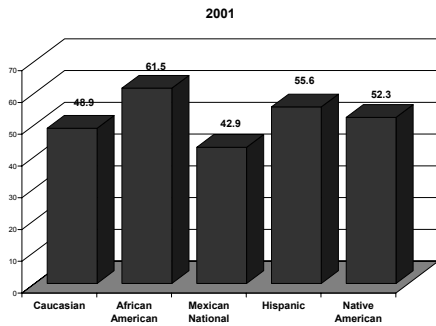
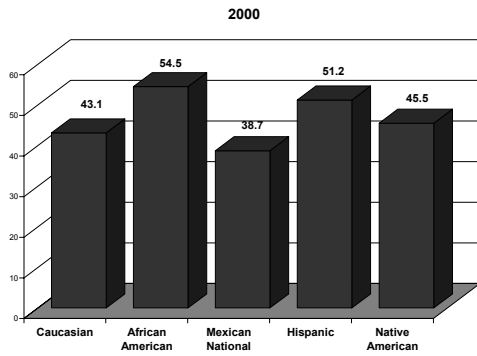
PAROLE SUSPENSIONS



- Hispanics and African Americans had their paroles suspended at levels higher than would be expected and Caucasians had their paroles suspended at lower levels. Native Americans, Mexican Nationals and Asians were suspended at expected rates.
- Hispanics were over represented in parole suspensions all three years, African Americans were over represented in 2000 and 2001.
- Hispanic males were over represented in all three years, while Hispanic females were over represented in 2002 (not shown).
- African American males were over represented in 2001 and African American females were over represented in 2000 (not shown).
- Each year, a larger proportion of the juveniles that had their paroles suspended were classified as medium rather than high or low risk. In 2002, 53% of all suspensions consisted of medium risk cases (not shown).

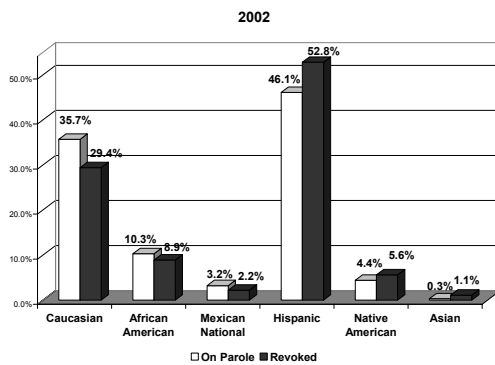
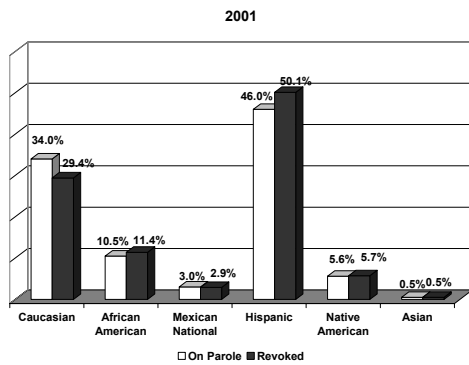
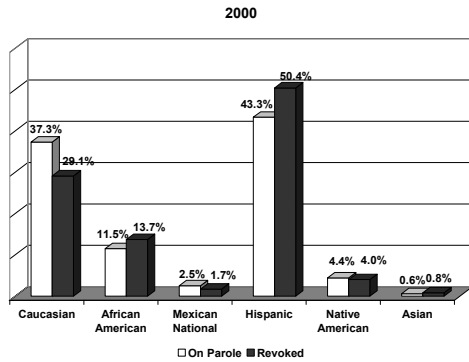
PAROLE SUSPENSION RATES

(per 100 juveniles of the same race/ethnicity on parole)



- Minorities (except for Mexican Nationals) had their paroles suspended at higher *rates* than Caucasians.
- African Americans had the highest parole suspension *rates* in 2000 and 2001; Hispanics had the highest parole suspension *rate* in 2002.

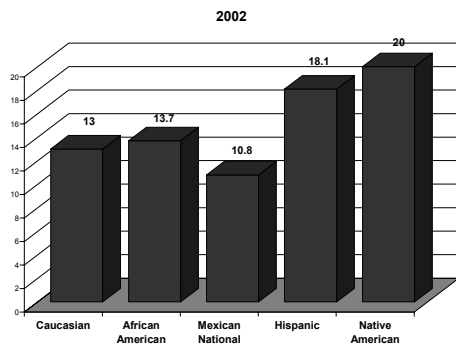
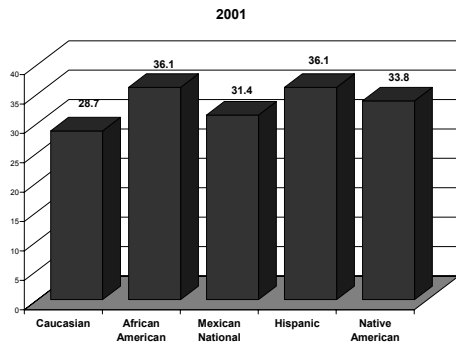
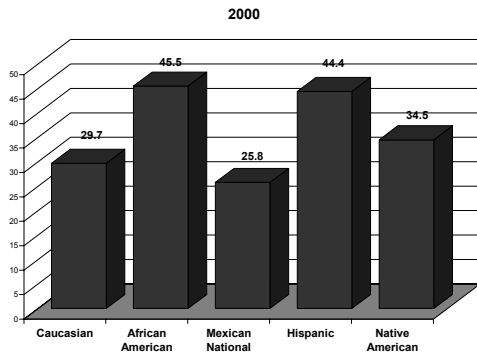
PAROLE REVOCATIONS



- Hispanics and African Americans had their paroles revoked at levels higher than would be expected; Caucasians and Mexican Nationals had their paroles revoked at lower levels than expected. Native Americans and Asians were revoked at expected rates.
- Hispanics were over represented in parole revocations all three years, African Americans were over represented in 2000 & 2001.
- Hispanic males were over represented in all three years and Hispanic females were over represented in 2002 (not shown). African American males were at least slightly over represented in 2000 and 2001 and African American females were over represented in 2000 (not shown).
- Rewards are juveniles on parole recommitted to ADJC by a juvenile court for a new offense. In 2000 and 2001, 15.5% and 16.6% respectively of the revocations were rewards. Due to the establishment of the Parole Reinforcement program, over two-thirds (67.2%) of the revocations in 2002 were rewards i.e., less than one-third of the revocations in 2002 were initiated by ADJC officials (not shown).
- Finally, 75.4% of the high risk juveniles were minorities (not shown).

PAROLE REVOCATION RATES

(per 100 juveniles of the same race/ethnicity on parole)



- Minorities (other than Mexican Nationals) had higher parole revocation *rates* than Caucasians.
- African Americans had the highest revocation *rate* in 2000 and African Americans and Hispanics had the highest revocation *rates* in 2001. Native Americans had the highest revocation *rate* in 2002.
- Among males, Hispanics had the highest revocation *rate* in 2000, African Americans had the highest *rate* in 2001 and Native Americans had the highest *rate* in 2002 (not shown).
- Among females, African Americans had the highest *rate* in 2000, Mexican Nationals had the highest *rate* in 2001 and Hispanics had the highest *rate* in 2002 (not shown).
- The disparity between Caucasian and minority revocation *rates* declined (except for Native Americans) over the three years examined. Nevertheless, in 2002, Native Americans had a revocation *rate* 54% higher, Hispanics had a *rate* 39% higher and African Americans had a rate 5% higher than Caucasians (not shown).