

MONTANA

AMERICAN INDIAN STUDENT ACHIEVEMENT DATA REPORT

FALL 2014



Denise Juneau, Superintendent
Office of Public Instruction

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Indian Education
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American Indian Student Data Report Fall 2014

As the Office of Public Instruction, school districts, communities, families and various partners work together across the state of Montana to ensure that all students' graduate career and college ready, it is important to use reliable data and effective data practices to make certain those goals are being met. For American Indian students in particular, in light of the educational achievement gap that exists across our state – from urban settings to reservation and off reservation schools in rural areas – this work is especially important. This data report is intended to cultivate a growing awareness, and assist local schools in their ongoing efforts to properly support the educational goals of American Indian students and their families. This important work will provide greater equity and ensure we are providing all students with rigorous and meaningful educational opportunities for success across our state.

Mandy Smoker Broaddus, Director of Indian Education

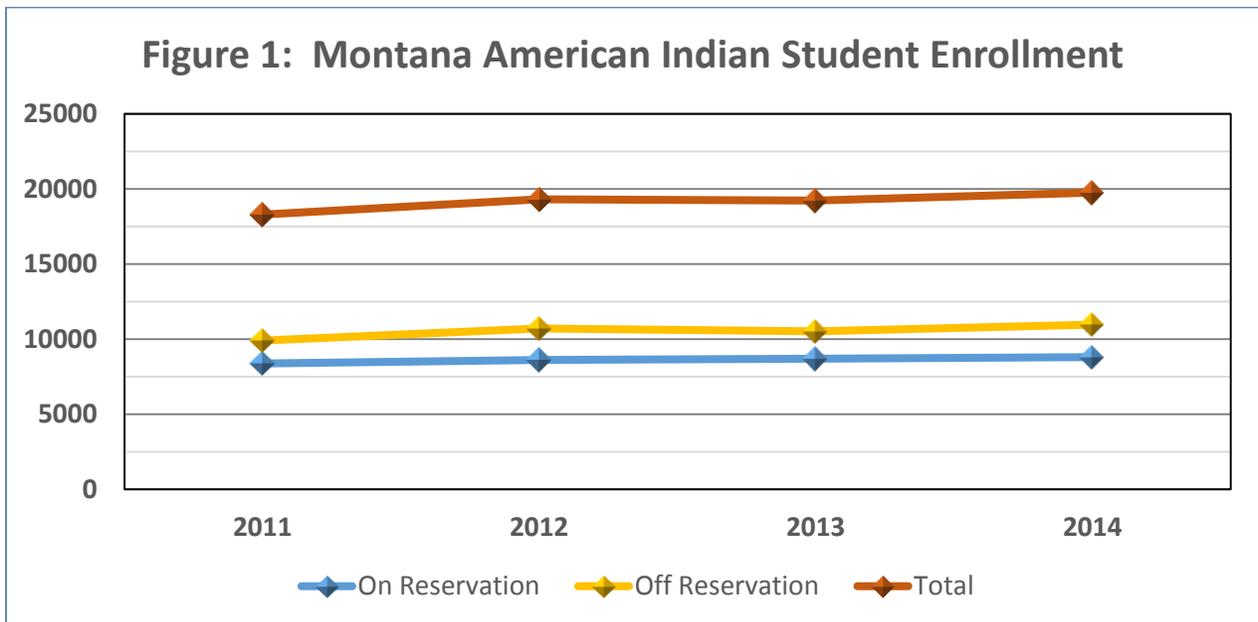
2007 MCA 20-9-330

In 2007, the Montana State Legislature passed Montana Code Annotated 20-9-330, appropriating \$200 per American Indian child, totaling over \$3 million dollars per year, to provide funding to school districts for the purpose of closing the educational achievement gap that exists between American Indian students and non-Indian students. According to MCA 20-9-330 (2) (a), funds were to be determined by “...using the number of American Indian students enrolled in the district based on the count of regularly enrolled students on the first Monday in October of the prior school year as reported to the Office of Public Instruction” and deposited into the district’s general fund.

This report is provided to track the American Indian achievement gap and provide data on the Montana American Indian student population.

2013-2014 Population Data

- 6.5 percent of Montana’s total population is American Indian (2010 Census), made up mostly of the twelve tribal nations of Montana: Assiniboine, Blackfeet, Chippewa, Cree, Crow, Gros Ventre, Kootenai, Little Shell Tribe of Chippewa, Northern Cheyenne, Pend d’Oreille, Salish, Sioux
- For the 2013-2014 school year there were 19,761 American Indian/Alaska Native students in Montana out of a total of 144,129 students enrolled in Montana’s K-12 public schools. 13.7 percent of Montana’s students are American Indian.
- Out of 823 public schools in Montana:
 - 58 public schools report 75 – 100% American Indian students within their school population.
 - 20 public schools report 50 – 75% American Indian students within their school population.
 - 38 public schools report 25 – 50% American Indian students within their school population.
- As of the count date (October 7, 2013) for the 2013-2014 school year 2,819 of all designated American Indian students were special education students. This leads to a special education rate among American Indian students of 14.3%. The special education rate among White students is 10.9%.
- Figure 1 shows the American Indian enrollment numbers for students in Montana public schools according to their location on a reservation. Schools are considered on reservation schools when they are physically located within a reservation boundary.



Criterion Reference Test (CRT)

Under Title 1 of the Elementary and Secondary Education Act (ESEA) of 1994, P.L. 103-382 and the No Child Left Behind Act (NCLB) of 2001, all states were required to develop statewide assessments for reading, mathematics, and science. The criterion-referenced test (CRT) was given every spring from 2006-2013 in compliance with federal law.

Starting during the 2013-2014 school year the state of Montana switched to the Smart Balanced test in order to appropriately test the Common Core curriculum in math and reading. Science was still tested with the CRT test during the 2013-2014 school year. The 2013-2014 school year was a pilot run of the Smarter Balanced test and therefore no test results are available for math and reading during that school year. The Smarter Balanced test is administered to 3rd-8th and 11th grade students.

The CRT was based on, and aligned to, Montana's Content Standards in reading, mathematics, and science. Montana educators worked with the OPI in the development and review (content and bias) of these tests to assess how well students have learned the Montana content standards for their grade. Since the 2007-2008 school year the test has been issued in the content areas of reading, math and science (science portion of the CRT was not administered for the first 2 years). Only 4th, 8th and 10th grade students take the science portion of the tests while 3rd-8th and 10th grade students take the reading and math portions of the test.

Math, science, and reading scores on the CRT are scored on a scale from 200 to 300 with 200 being the low score. The proficiency levels are broken down as (there is some variability in the cut-off between Proficient and Advanced scores based on the grade the student is in):

- Novice 200 – 224
- Near Proficient 225 – 249
- Proficient 250 – 275
- Advanced 276 – 300

A student who scores 250 or above in a subject is considered to be proficient in that subject and meets the requirements set forth by the NCLB Act. The CRT results are modeled such that if a student scores 250 in a subject during one school year and makes the appropriate progress in skill level for the next school year, his or her score for that subject will remain relatively unchanged.



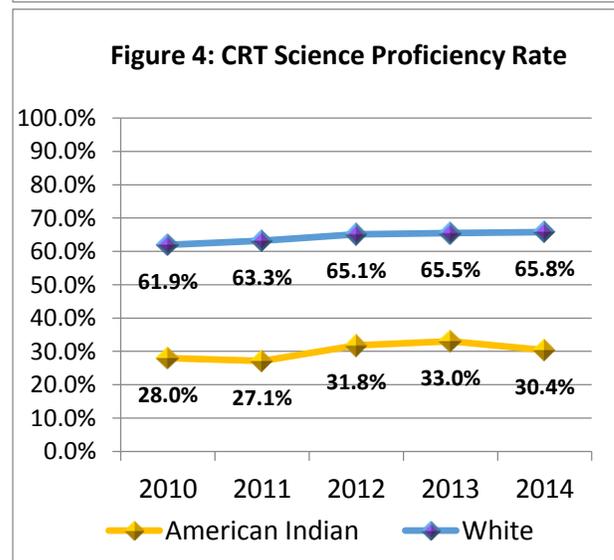
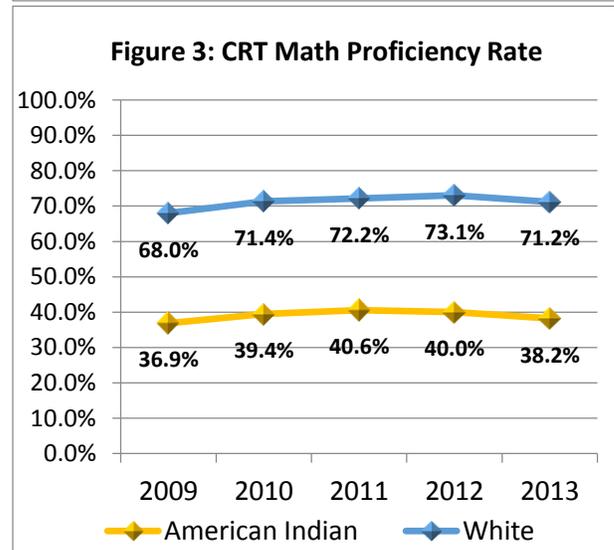
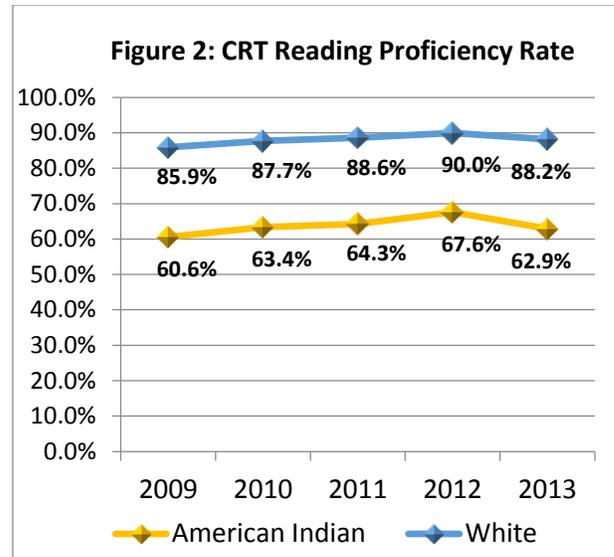
Artwork by Korbin Cole, Frazer High School

In 2013, CRT results were generally lower across the board. Figure 2 shows that after increasing for each of the past four years, only 62.9% of American Indians scored proficient on the reading assessment during the 2012-2013 school year. This was a significant decrease compared to the 67.6% that were proficient in 2012. Decreases occurred for both American Indian and White student groups, but the decrease for American Indian students was larger and was down to the level seen before 2010.

The same decreasing trend is shown in Figure 3 for Math CRT proficiency rates. For the second year in a row the American Indian math proficiency rates have decreased. The math proficiency level has dropped to a level not seen since before the 2010 school year.

Science has historically had the lowest proficiency rates among all groups of students. Science CRT scores, which are available for the 2013 - 2014 school year and are shown in Figure 4, had mixed results. Statewide American Indian student proficiency rate in science decreased to 30.4% from a high of 33.0% in 2013. While this is a sizable decrease, the proficiency rates are still significantly higher than before 2012.

Smarter Balanced test results will be available at the student level and for all student groups starting during the 2014-2015 school year. Test scores from the Smarter Balanced test will not be able to be directly compared to CRT test results from previous years.

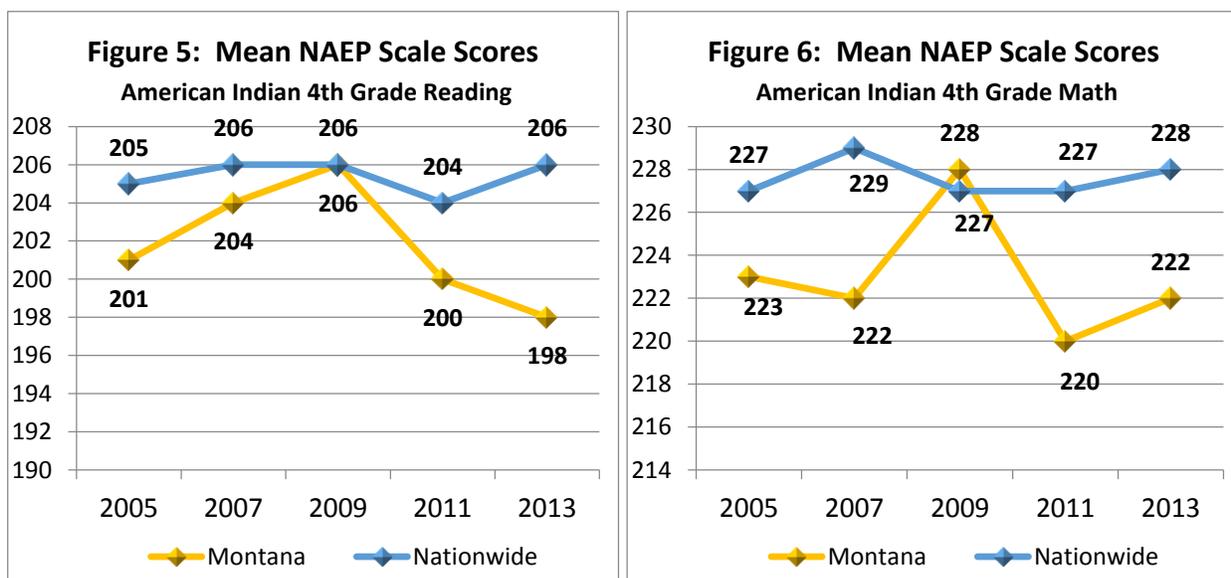


National Assessment of Educational Progress (NAEP)

The NAEP test is a national assessment that is given every two years to randomly selected schools across the nation and Montana. The most recent NAEP test was given during the 2012-2013 school year. The NAEP test in Montana has historically only been given to 4th grade and 8th grade students in mathematics and reading. The NAEP scores are on a scale of 0 – 500 with 500 being the highest score. Scores across grades or across subjects can't be compared to each other because they are not scaled the same, i.e. a 4th grade scale score can't be compared to an 8th grade scale score. The NAEP scores and results also can't be compared to the CRT or Smarter Balanced tests; the NAEP tests are designed differently and are essentially testing for different things.

4th Grade

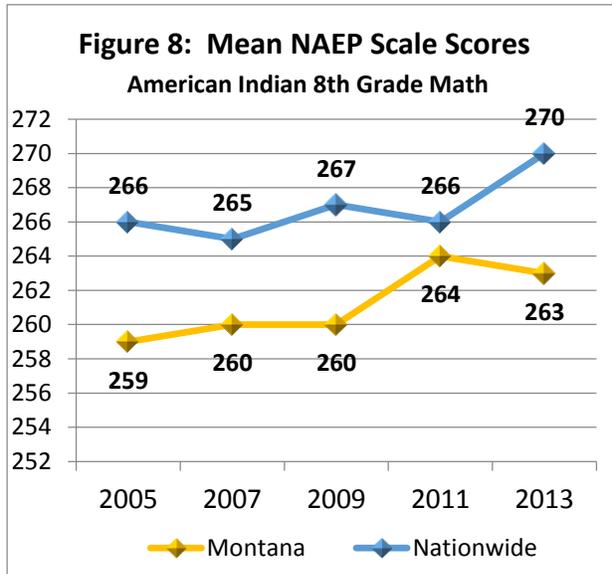
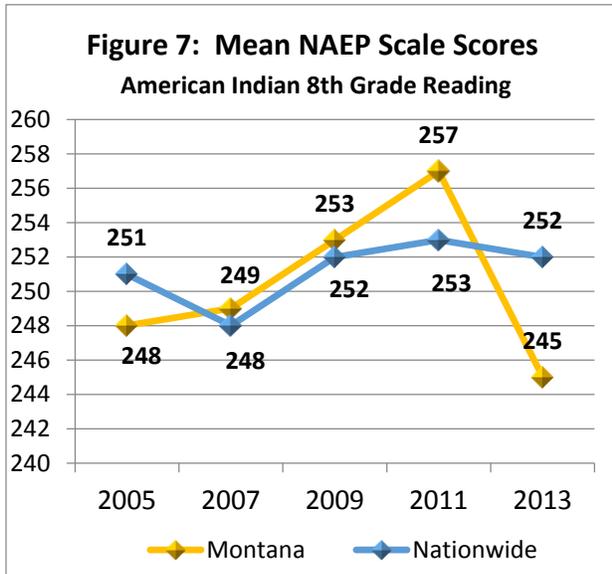
In Figure 5 the 4th grade reading scores of American Indian students for the last 5 testing cycles are shown at both the national and state levels. The graph shows there has been a drop in test scores during the last two tests in 2011 and 2013. The drop from 2009 to 2011 was statistically significant while the change from 2011 to 2013 is not. Also of note is the fact that the mean NAEP scale scores for 4th grade reading are lower for Montana than they are nationwide. The math results for 4th grade students are shown in Figure 6. The pattern of the graph is similar to that of the reading except for the fact that math scores increased from 2011 to 2013. The increase in scores from 2011 to 2013 in math is not statistically significant, although the decrease from 2009 to 2011 was.



There are ten states (Alaska, Arizona, Montana, New Mexico, North Dakota, Oklahoma, Oregon, South Dakota, Wyoming, Wisconsin) that have a significant enough American Indian population that the sample sizes and test results are large enough to report for 4th grade. In 2013, of those ten states, Montana is ranked sixth in 4th grade math scores for American Indian students and 5th in reading scores.

8th Grade

Scores for 8th grade American Indians decreased in both reading and math from 2011 to 2013. Figure 7 shows the math scores had increased the last 4 cycles of the test, but had a statistically significant drop in 2013. The last time this score decreased was in 2003. The large drop in the math scores also lowered the Montana mean score below the nationwide mean score for the first time since 2005. While reading scores also decreased, the mean score for 2013 stayed above the long term average. The nationwide mean score for reading increased a significant amount for 2013.



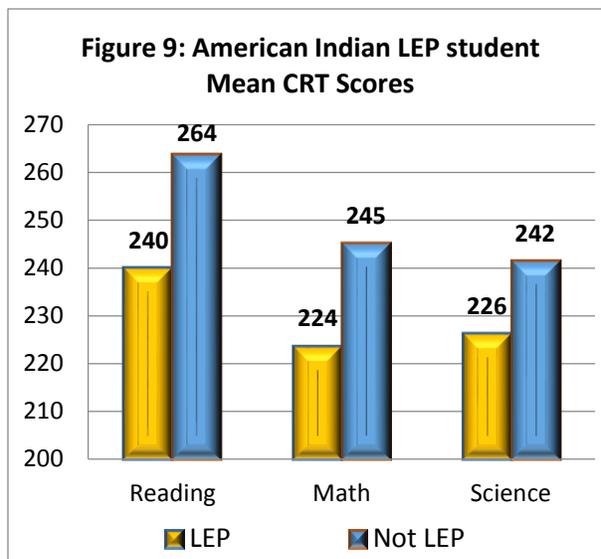
There are nine states (Alaska, Arizona, Montana, New Mexico, North Dakota, Oklahoma, Oregon, South Dakota, Wyoming) that have a significant enough American Indian population that the sample sizes and test results are large enough to report for 8th grade. In 2013, of those nine states, Montana is ranked fourth in 8th grade math scores for American Indian students and 6th in reading scores.

Limited English Proficiency (LEP) students and English Language Proficiency (ELP) Test

LEP students in Montana are generally students who have impact from a language other than English in their environment, usually at home. All LEP students in Montana are required to take the ELP test, as a result of No Child Left Behind Act. The students can then test out of LEP status and become Former LEP. Former LEP status is then tracked for at least two years. The ELP test is used to test the LEP students for English proficiency but other factors such as grades, state assessments, and teacher input are the determining factors for whether or not a student is moved to Former LEP.

In 2014 there were 3443 LEP students, which was a slight decrease from 3755 the year before. Most of these LEP students are American Indian, with 75.9% of all LEP students being American Indian students.

The percent of all LEP students who have been LEP for 5 or more years is 25.6%. It is well known in the education community, both nationally and in the state of Montana, that the lowest scoring demographic of students are the LEP students. The longer the student is an LEP student the more effect it has on that student later on. Figure 9 shows the difference between LEP students and other students on the CRT during the 2012-2013 school year.



During the 2013-2014 school year 3404 students took the ELP test during the December to January testing window. The ELP test has 5 different domains for testing students: Writing, Listening, Speaking, Reading, and Literacy. A total score is then found using the 5 domains. To be considered proficient in Montana a student must score at least 4.0 on literacy and 5.0 on total proficiency. Of the students who took the test in 2013-2014, 503 of them, or 14.8%, were tested as proficient.

Graduation Rates

The graduation rates discussed in this report are the NCLB graduation rates that determine the percentage of students who graduate in four years or less. For the third year in a row, the graduation rates in Montana continued to increase. The overall graduation rate for all students in Montana during the 2012-2013 school year improved to 84.4% as compared to 83.9% in 2011-2012.

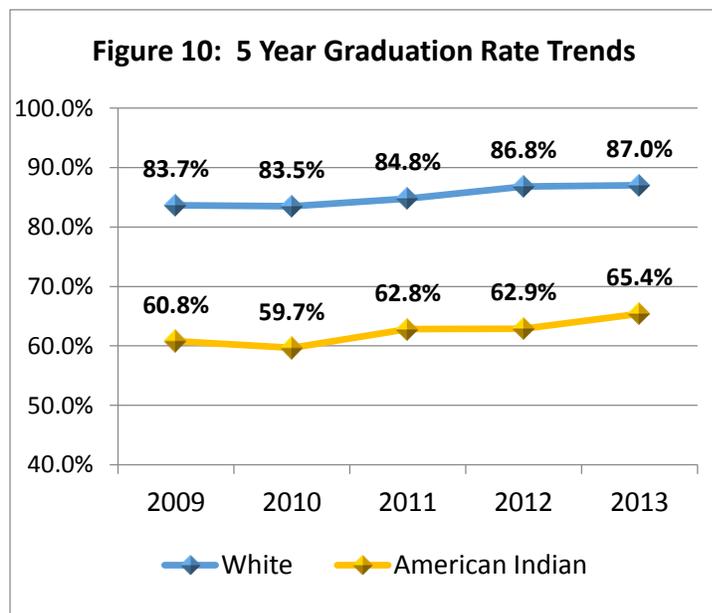


Figure 10 shows the graduation rates for White and American Indian students over the past 5 years. Both student groups have increased their graduation rates every year since 2010. While the American Indian graduation rate increased 2.5 percentage points in 2013 compared to 2012, it is still 21.6 percentage points below the White student graduation rate. Also of note is LEP students had a graduation rate of 56.8% during the 2012-2013 school year. The LEP graduation rate includes any students who were LEP at any time during their high school years.

Dropout Rates

The dropout rates presented here are an event rate, which is the percentage of total students who dropped out during that year. Dropout rates in general in Montana continued to drop during the 2012-2013 school year, just as they have the past few years. In 2012-2013 the American Indian dropout rate was 6.5% after being 7.1% the previous year. The American Indian dropout rate is still significantly higher than the dropout rate for White students at 1.9% for the 2012-2013 school year. These dropout rates include both 7th-8th grade students and high school students.

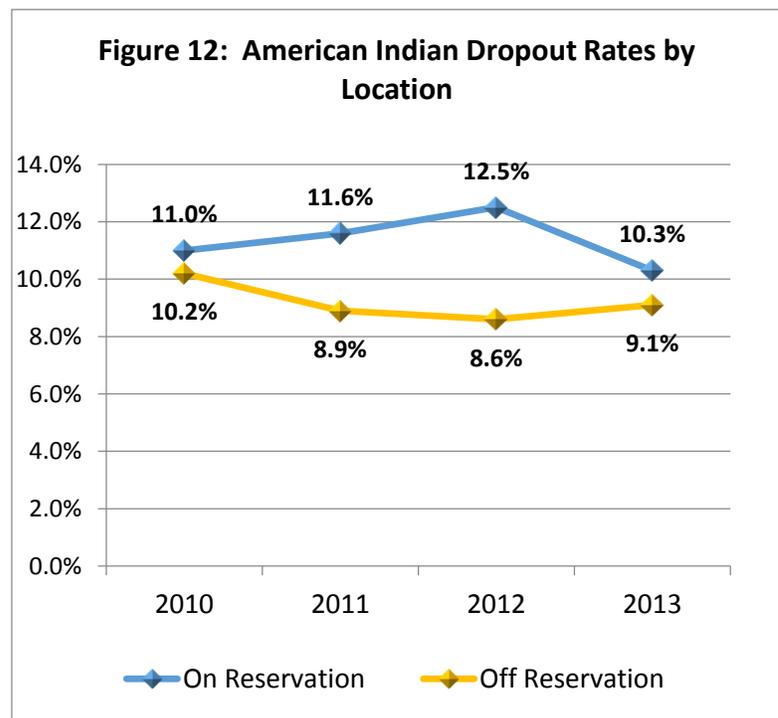
Dropout rates before and during high school are shown in Figure 11. American Indian students tend to drop out at an earlier grade than other students. This can be seen in Figure 11 looking at the 7th and 8th grade dropout rates but it is also true in high school. Even at the high school level, American Indian students tend to drop out at an earlier grade than White students.

Figure 11: 2012 – 2013 Dropout Rates by Grade

	Grades 7 – 8	Grades 9 – 12	Total
American Indian	0.9%	9.6%	6.5%
White	0.1%	2.8%	1.9%
Overall	0.1%	3.6%	2.4%

Figure 12 breaks down the differences in dropout rates of High School aged American Indian students from schools physically located within a reservation boundary to schools located outside the reservation boundaries. There are two big trends that were broken here during the 2012-2013 school year. Since 2010 the dropout rates for American Indians in schools located on a reservation has increased while their counterparts off the reservation have been decreasing. Both of those trends changed during 2012-2013 as the off reservation dropout rate went up to 9.1% and the on reservation rate went down to 10.3%.

While the dropout rates are now closer than they have been the past two years, there is still a higher percentage of students dropping out in schools that are physically located within a reservation boundary. Also of note is the dropout rate for Non-American Indian students located on or off the reservation. The Non-American Indian dropout rate for on and off the reservation is much lower at 2.8% and 2.9%



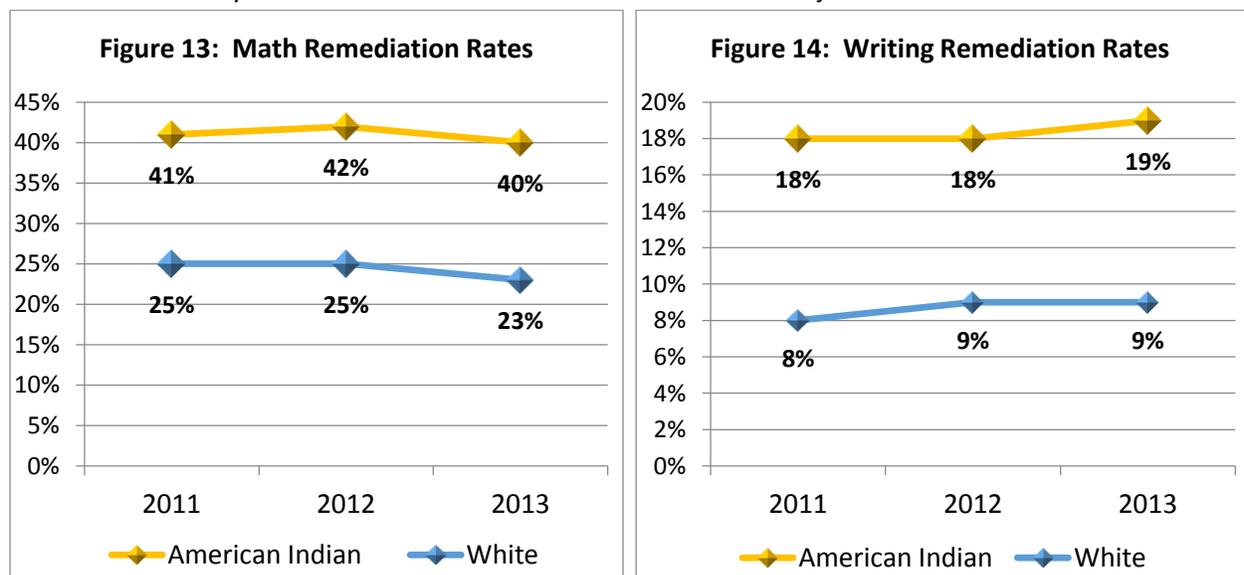
College Data

College data presented here does not include Montana Tribal College enrollment numbers and data since it is not available from those schools. One way of determining what students are doing after graduating from high school is the college capture rate. This is the rate of students who enroll in college within the U.S. within 12 months of graduating. The high school graduation class of 2010-2011 for American Indian students had a college capture rate of 32.6% while the rate for 2011-2012 was 31.1%. For comparison the White student college capture rates were 61.4% for 2010-2011 and 60.7% for 2011-2012.

A second piece of data that is used is called the college persistence rate. This is the rate of students who after enrolling in college within the first year of their high school graduation, return to a college or university the next year. For American Indian students who graduated in 2010-2011 the college persistence rate was 63.0%. This compares to 81.5% for White students from the same school year.

Remediation rates are also another way of tracking students once they enter college. Remediation rate is the rate of students who enter college within 16 months of graduating high school and enroll in either a remedial writing or math class (remedial courses are usually courses with course numbers less than 100). The rates presented in this report are only for campuses of the Montana University System.

Figures 13 and 14 show the remediation rates for math and writing. The rates for all categories have not changed much in the last 3 years. What can be seen in Figures 13 and 14 is the American Indian remediation rates are much higher than the rates for the White students. The overall remediation rates, the rate the student took either a remedial math or writing course, for 2012-2013 are 48% for American Indian students and 27% for White students. When comparing this to the rates in Figure 13 and 14 it indicates that many students who take a remedial course in one subject also take one in the other.



Student Surveys

There are two student surveys administered in the state of Montana, the Youth Risk Behavior Survey (YRBS) and the My Voice Student Survey. Neither survey polls every student and both surveys use sampling procedures to estimate for the entire population. The YRBS survey has been conducted once every two years since 1993, with the last one being during the 2012-2013 school year. Some results are discussed here but you may find the entire YRBS report at <http://www.opi.mt.gov/yrbs>. The My Voice survey has been conducted annually since the 2010-2011 school year. The full My Voice report for 2012-2013 can be found at http://opi.mt.gov/Programs/SchoolPrograms/MBI/index.html#gpm1_7.

The 2013-2014 My Voice report was not available at the printing of this report, but it will be posted on the OPI website when it is available. The 2012-2013 results will be discussed in this report.

Figure 15 shows some selected questions and demonstrates the differences between American Indian students on or near reservations and in urban schools. While the percentage of American Indian students from reservation schools who carried a weapon is lower than the statewide percentage, the percentage of American Indian students from urban schools is higher than the statewide percentage. This is a trend that has been revealed in the YRBS results for years. Some good news is the percentage of American Indian students in urban schools carrying a weapon decreased for the first time since the question has been tracked in 2003.

Another area the YRBS survey focuses on is the use of drugs, alcohol, and tobacco. Many studies have shown the detrimental effects that drug, alcohol, and tobacco use have on a student's academic achievements.

Figure 15 also shows the results of some selected survey questions on drugs, alcohol, and tobacco use. Most of these survey questions are on a decreasing trend. American Indian students reflect significantly higher percentages in all of these areas over other students. Most of the survey results also show a higher drug, alcohol, and tobacco use among American Indians located on or near the reservation as compared to those in urban schools.

Cigarette smoking is still high among American Indian students in Montana, although it has decreased steadily since 1999. For American Indian students on or near a reservation, the percentage of students who had tried cigarette smoking was 86.9% in 1999 and is down to 65.6% in 2013. For urban American Indian students the



Artwork by Joni Jones, Frazer High School

percentage is down to 56.2% from 79.5%. All questions regarding smoking cigarettes have seen a steady decrease since 1999.

While the percentages for chewing tobacco have remained relatively constant since 1999 the percentages for alcohol consumption have also decreased significantly since 1999 and especially since 2007. In 2007 the percentage of American Indian students on or near the reservation who had more than a few sips of alcohol before turning 13 years old was 31.1% and was 24.0% in 2012-2013. For Urban schools in 2007 the percentage was 40.6% and in 2010-2011 it was down to 29.0%.

Figure 15: YRBS Results			
Injury and Violence			
AI denotes American Indian students			
	High School Students	AI on or near Reservations	AI in Urban schools
Percentage of students carrying a weapon anytime the past 30 days.	25.7%	19.8%	30.9%
Percentage of students who were in a physical fight one or more times during the past 12 months.	22.8%	34.9%	37.7%
Percentage of students who had ever been bullied on school property during the past 12 months.	26.3%	21.1%	31.8%
Percentage of students who had been threatened or injured with a weapon such as a gun, knife, or club on school property one or more times during the past 12 months	6.3%	6.4%	12.0%
Percentage of students who felt so sad or hopeless almost every day for two weeks or more in a row that they stopped doing some usual activities during the past 12 months	26.4%	33.2%	38.3%
Percentage of students who actually attempted suicide one or more times during the past 12 months	7.9%	15.1%	20.6%
Drug, Alcohol, and Tobacco Use			
Percentage of students who ever tried cigarette smoking, even one or two puffs.	41.1%	65.6%	56.2%
Percentage of students who have taken a prescription drug (such as OxyContin, Percocet, Vicodin, codeine, Adderall, Ritalin, or Xanax) without a doctor's prescription.	16.2%	19.7%	25.2%
Percentage of students who used chewing tobacco, snuff, or dip on one or more of the past 30 days.	13.4%	19.6%	17.7%
Percentage of students who had at least one drink of alcohol other than a few sips before age 13 years.	19.9%	24.0%	29.0%
Percentage of students who used marijuana one or more times during their life.	37.6%	65.3%	49.4%
Percentage of students who sniffed glue, breathed the contents of aerosol spray cans, or inhaled any paints or sprays to get high one or more times during their life.	9.9%	19.0%	18.5%

The My Voice survey asks different types of questions than the YRBS survey. Examples are questions relating to the students belonging in school, sense of accomplishment, curiosity, and leadership. There are several ways the My Voice survey may be broken up. There are three groups that will be focused on for this report: American Indians in schools where the majority of students are American Indian, American Indians in schools where the majority of students are not American Indian, all White Students.

Figure 16 shows some questions that were selected from the My Voice survey. Some of the questions were selected for differences between White students and American Indian students. Others were selected because of the difference in answers provided by American Indian students. The full My Voice report also has some breakdowns by race, gender, and grade.

Figure 16: Selected My Voice Survey results			
AI denotes American Indian students			
Percentages are the percentage of students that responded "Yes"	AI in schools where they are the majority	AI in schools where they are not the majority	White Students
I am a valued member of my school community.	36%	40%	48%
I have a teacher who is a positive role model for me.	61%	65%	79%
I am a good decision maker.	52%	59%	72%
I am afraid to try something if I think I may fail.	43%	38%	28%
I feel comfortable asking questions in class.	54%	55%	66%
My teachers present lessons in different ways.	65%	74%	76%
I think it is important to set high goals.	89%	83%	85%
Teachers are willing to learn from students.	49%	56%	53%

Advanced Placement (AP) Tests

There were 1,873 Montana graduating students in the 2012-2013 school year who took at least one AP exam during high school. Statewide that was a decrease from the 1,913 that took at least one AP exam from the 2011-2012 graduating class. Out of the 1,873 students, 57 were American Indian. Only 7.6% of graduating American Indian students took an AP exam, which is significantly less than the 21.6% of the White graduating students that took at least one AP exam. Although not all Montana schools are able to offer AP classes and exams, the number of American Indian students taking AP exams is low.

On an AP exam taken for any subject, a passing test is scored as a 3 or higher. From the graduating class of 2012-2013, only 9 American Indian students (15.8%) earned a 3 or higher on at least one AP exam. When looking at all students combined, 63.3% of them passed at least one AP exam.

ACT Test

The ACT is a national college admissions examination that consists of subject area tests in Mathematics, Reading, English, Writing and Science. Montana students are given the opportunity to take the ACT test during their 11th grade year, free of charge thanks to grant money provided by the GEAR UP program. Many 12th grade students also take the test a second time for their college admissions requirements. The test results discussed in this report are from the 11th grade students. During the 2013-2014 school year there were 7533 White students and 807 American Indian students who took the test as 11th graders.

The ACT College Readiness scores are the scores ACT has determined a student needs in that domain to have at least a 50% chance of getting a B or higher in the corresponding college courses. Keep in mind these test scores are for 11th grade students, and the college readiness score is used from their 12th grade ACT score. Figure 17 shows the mean scores for 11th grade test takers during the 2013-2014 school year. It can easily be seen in Figure 17 that American Indian scores are lower in all domains with the biggest difference coming in English.

Figure 17: 2013-2014 Mean ACT Test Scores by Domain and Race						
	Composite	English	Math	Reading	Science	Writing
American Indian	16.6	14.5	17.3	17.2	17.0	5.3
White	20.4	19.0	20.6	21.0	20.6	6.4
College Readiness	22	18	22	21	24	-

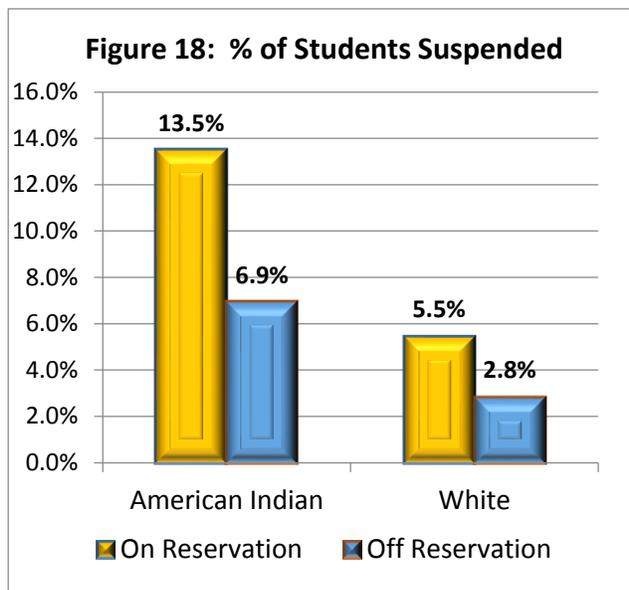
Special Education Students

During the 2013-2014 school year there were 16,275 total special education students in Montana. This was an increase from the previous year's count of 15,196. Of those 16,275 special education students, 2,819 of them were American Indian students. Of all American Indian students in Montana, 14.3% were identified as special education students. This compares to 14.7% for the 2012-2013 school year. The percentage of American Indians students who are designated as special education is also higher than the percentage of White students who are designated as special education students. For the 2013-2014 school year 10.9% of all White students were identified as special education students.

Suspension/ Expulsion Data

As of the writing of this report, the 2013-2014 suspension and expulsion data had not been finalized. The 2012-2013 data will be discussed here. Statewide, 9.9% of all American Indian students were given at least one out of school suspension during the 2012-2013. That compares to 2.9% of White students who were given an out of school suspension.

Regardless of race, students located in schools within reservation boundaries were almost twice as likely to be suspended compared to those located outside the reservation boundaries. Figure 18 shows the comparison by percentage of students suspended when looking at on reservation schools versus off reservation schools. Of American Indian students in schools on the reservation, 13.5% had to serve at least one out of school suspension during the 2012-2013 school year. For schools located off the reservation, the percentage was 6.9%. Both of these values are higher than the percentages of White students serving suspensions on or off the reservation.



Students expelled from school for any time frame also show similar trends to that of the out of school suspensions. Expulsion numbers for the state are relatively small, which causes a lot of fluctuation from year to year and makes comparisons difficult. There were 35 American Indians expelled for some time period during the 2012-2013 school year while the number of White students expelled was 59. Considering the White student population in Montana is about 7 times larger than the American Indian student population, a significantly higher percentage of American Indian students are being expelled.

Summary

American Indian students in Montana did not score as well on the CRT as students of other races/ethnicities. Even though scores are not yet available for the Smarter Balanced test, previous testing data suggests the trend will continue. However, since 2008 the general trend in American Indian student scores have been improvements. Obviously there is room for more improvement in all areas, such as dropout rates, test scores, and graduation rates. Improvements in these areas will not happen overnight but it is important for the future of Montana for the American Indian student achievement gap to continue to get smaller.

Most data presented throughout this report, along with other education and school related data, is also available on the state GEMS data website at <http://gems.opi.mt.gov>. This document is also located electronically on the OPI webpage at <http://opi.mt.gov/Reports&Data>.

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