

Executive Summary

Wisconsin Knowledge and Concepts (WKCE) Test

Introduction

The 2007-08 school year marked the third consecutive year in which testing in grades 3 through 8 and 10 was conducted in fulfillment of the No Child Left Behind federal law. The Wisconsin Knowledge and Concepts Exams (WKCE) is a criterion-referenced test (CRT) where a student's performance is compared to a specific set of criteria. The WKCE-CRT includes testing in all seven grade levels reading and math and in grades 4, 8 and 10 additional testing in language arts, science and social studies. More than 12,300 MMSD students participated in this year's WKCE-CRT.

Under NCLB, schools are required to test 95% of their full academic year (FAY) students in reading and math. Madison's test participation rates exceeded 95% in all grade levels. Grades 3 through 8 achieved 99% test participation or higher while the District's 10th graders reached 97% in test participation.

The changing demographics of the district affect the overall aggregate achievement data. As the district has a greater proportion of students from subgroups which are at a disadvantage in testing, e.g., non-native English speakers, or English language learners (ELLs), the overall district averages will decline despite consistent performance among other student subgroups. Therefore, it is important disaggregate the data to interpret and understand the district results.

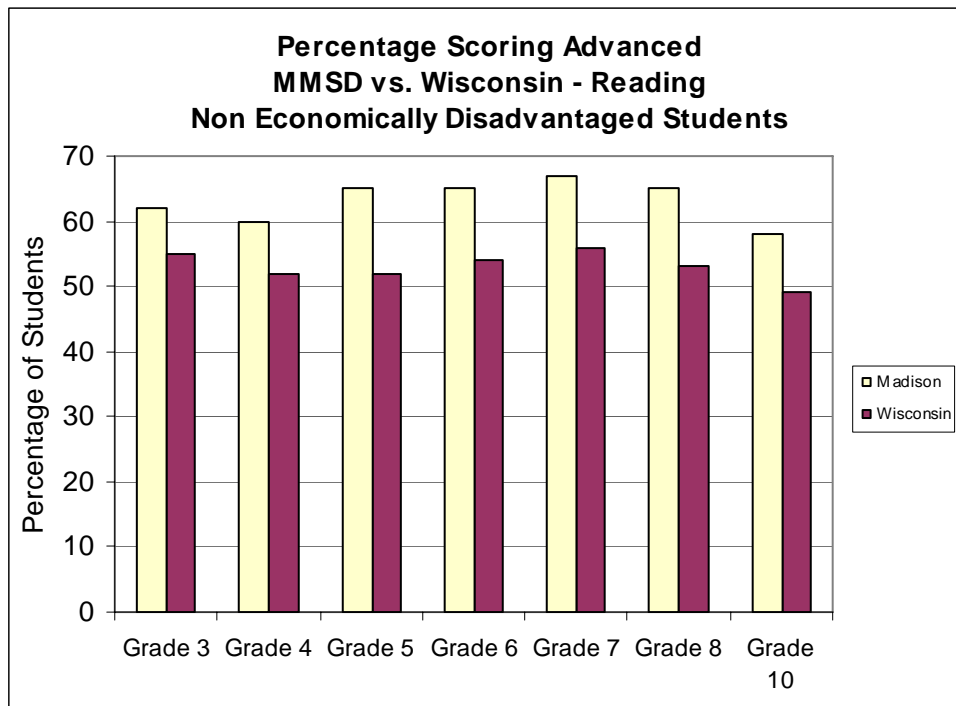
Across the twenty three subject tests (two subjects in grades 3, 5, 6, and 7, and 5 subjects in grades 4, 8, and 10), there were 19 that recorded decreases in the percentage of students scoring proficient or higher and 4 that had increases in that percentage. All of the changes both increases and decreases involved very small percentage point changes. The general conclusion is that we have remained basically the same over the past two years.

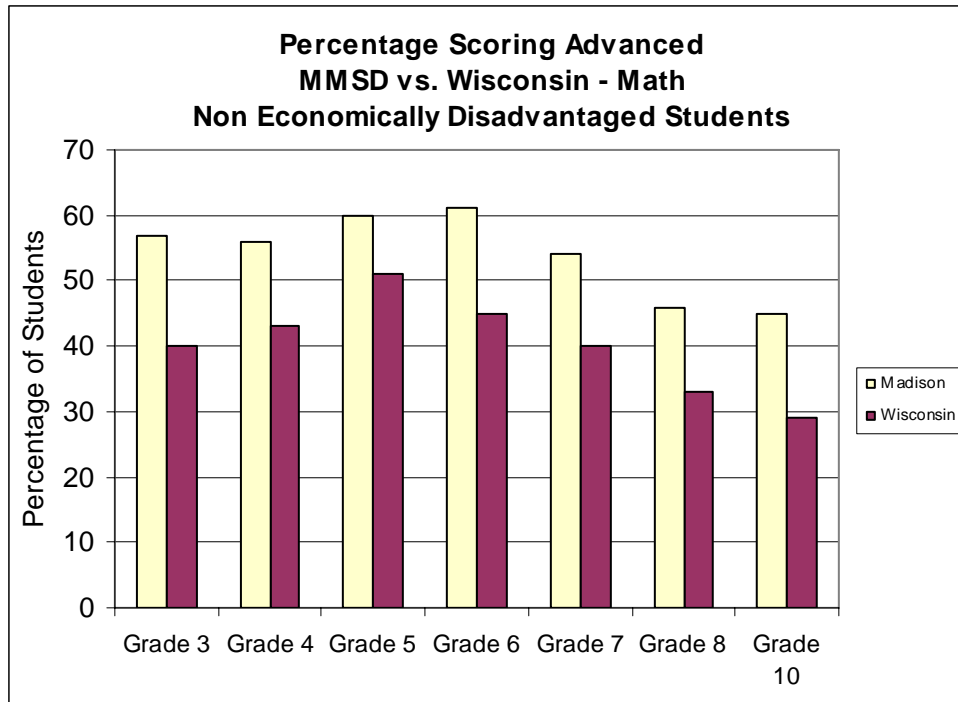
Group	Reading			Math		
	Decline	No Change	Improve	Decline	No Change	Improve
All Students Enrolled at Least One Full Academic Year	Grade 3 Grade 4 Grade 5 Grade 6 Grade 8		Grade 7 Grade 10	Grade 3 Grade 4 Grade 6 Grade 7 Grade 8 Grade 10		Grade 5
ELL	Grade 3	Grade 7 Grade 8	Grade 4 Grade 5 Grade 6 Grade 10	Grade 3 Grade 5 Grade 7 Grade 8 Grade 10	Grade 6	Grade 4
Not ELL	Grade 3 Grade 4 Grade 5 Grade 6		Grade 7 Grade 8 Grade 10	Grade 4 Grade 8 Grade 10	Grade 3 Grade 7	Grade 5 Grade 6
Low Income	Grade 3 Grade 4 Grade 6	Grade 5	Grade 7 Grade 8 Grade 10	Grade 3 Grade 6 Grade 7 Grade 8 Grade 10		Grade 4 Grade 5

	Reading			Math		
Group	Decline	No Change	Improve	Decline	No Change	Improve
Not Low Income	Grade 3 Grade 6	Grade 5 Grade 7 Grade 10	Grade 4 Grade 8	Grade 3 Grade 4 Grade 7 Grade 10	Grade 8	Grade 5 Grade 6

In reading, across the seven grades tested five grades had a decline from the previous year while two grades improved. In math, six of seven grades declined. But a disaggregation of the data shows that much of the changes recorded for the total tested population were actually a function of the changing demographics of the district population as a whole.

Once again this year, a consistently higher percentage of MMSD students perform at the highest proficiency level - Advanced - than do students across the state as a whole on the WKCE reading and math tests. The difference is especially high in the mathematics subject area. This pattern of higher advanced scores in Madison is consistent with past years. The pattern of greater proportions of advanced students in MMSD compared with the state as a whole is also found among many of the student subgroups in particular non-low income students, students who change schools less frequently, native English speakers, students who are not native English speakers, and African American students (in math).



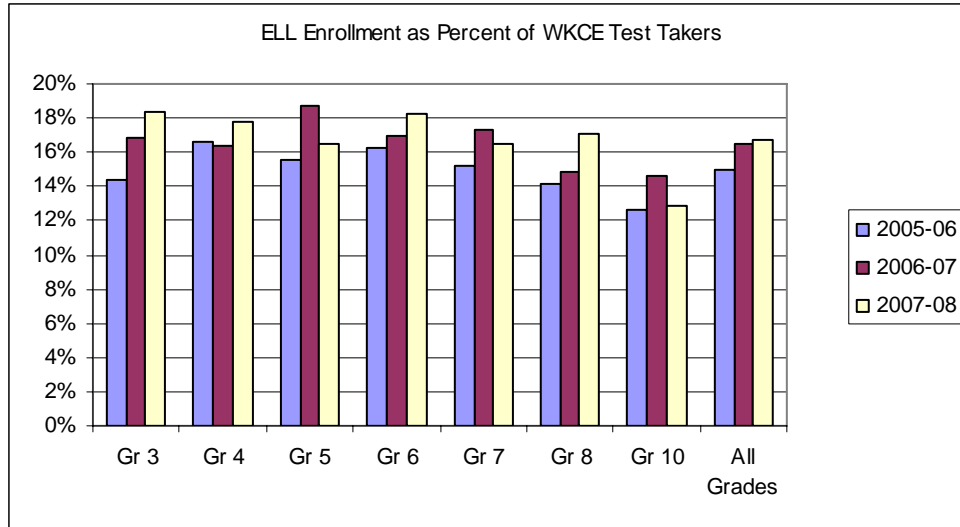


Similarly, a consistently higher percentage of MMSD students score at the lowest proficiency level - Minimal - than do students across the state. This is evidence of the higher degree of economic and ethnic/racial diversity in MMSD compared with other Wisconsin school districts. In other words, MMSD is a more “bi-modal” distribution of student achievement performance than the state as a whole. This reinforces the array of learning needs within the MMSD.

Shifting Demographics

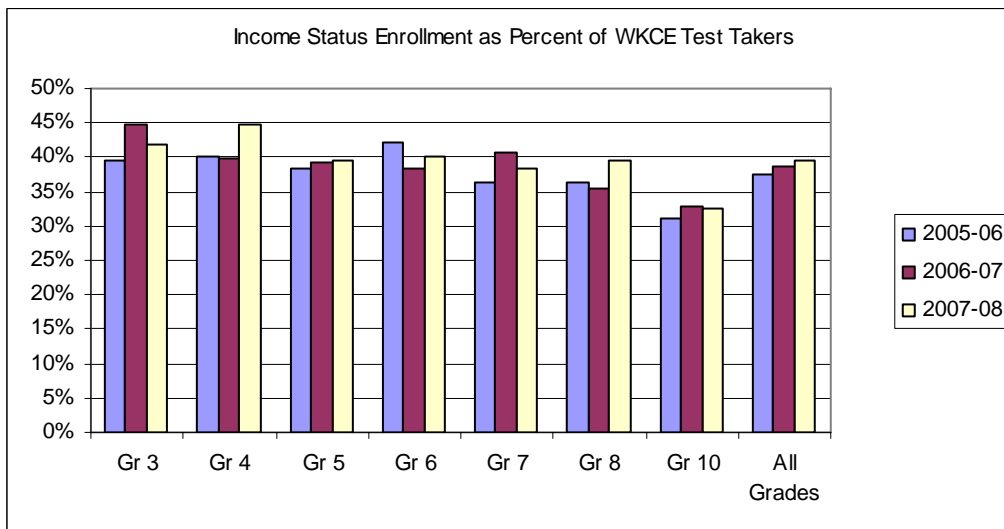
Starting in 2006-07, a significant change in the testing procedures allowed by the federal government is the requirement that English language learner (ELL) students participate in the regular English-language WKCE-CRT testing rather than an alternate test regardless of the English language proficiency. This change resulted in a significantly increased percentage of students scoring in the lowest proficiency category, minimal, because many ELL students do not read English at all at the time they take the test. Across all grades in 2007-08, fifty-one percent (51%) of these ELL students scored minimal and twenty-two percent (22%) scored basic in reading.

Over the past three years the MMSD test taking population has seen a gradual and continuous increase in students who are not native English speakers. As an example, for grade 3 the proportion of students taking the WKCE reading test who are English language learners (ELLs), i.e., not native English speakers, has increased from 14% in fall 2005 to 18% in fall of 2007.



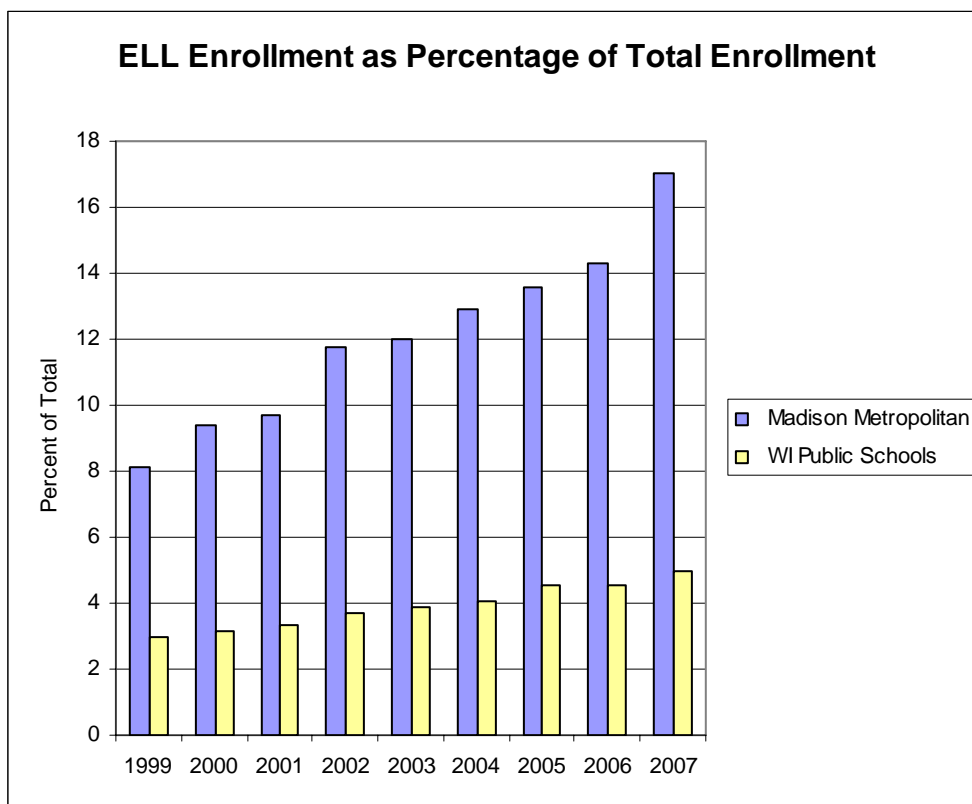
Among ELL students, gains were made on the reading test between 2006 and 2007 in five of seven grades. For native English speakers there were gains in three of the seven tested grades. Clearly, when the test data are disaggregated into subgroups it is apparent that improvements are being made. Yet, when data are aggregated into a single student group, and the changing demographics are not accounted for in the analysis, it can create a false perception of decline. Student performance within subgroups has been steady or in some cases improved.

The district continues to have a larger share of its students coming from low income households. Like ELL students, research has clearly shown that low income households are at a general disadvantage in regard to their children's education. As the proportion of low income students increases overall, average district scores will decline. However, that does not imply that performance among traditionally high performing groups will also decline. In fact, to the contrary, performance among non-low income households continues to be at the traditionally high levels the district has come to know over the years and has not been affected by the shifting demographics of the district.



These changes are also important when interpreting comparison between MMSD student performance against the state as whole. Taken in aggregate, MMSD student performance is not comparable to the state simply because of the significant difference in student subgroups comprising total enrollment. A

good example is among non-native English speaking students, or English language learners (ELLs). The chart below is taken from the Wisconsin Department of Public Instruction's (DPI) Wisconsin Information Network for Successful Schools (WINSS) web site. Clearly, the MMSD has a much higher proportion of ELL students than does the state as a whole. Given that ELLs must take a test that is not in their native language, it is understandable why the MMSD aggregate performance statistics might lag the state's. Therefore, when interpreting comparative achievement results it is very important to analyze data by specific student subgroups.



In the following sections more detailed analyses are provided of the district's WKCE reading and math results.

Reading

In general, across the tested grades levels the reading performance of non-low income students, non-ELL students, and white students remains very high. Reading in grades 5, 6, and 7 is relatively unchanged overall between last year and this year despite changing demographics of the tested population. Also of particular note, grade 10 reading increased slightly this year over last year for almost all student subgroups.

Grade 3 reading appears to be dropping slightly among low income students, non-low income students, ELL students (primarily the Hispanic student subgroup this year), and non-ELL students (primarily the white student subgroup this year). Grade 4 reading is declining slightly driven mainly by native English speaking, low income students (primarily among the African American and Asian student subgroups this year). Reading proficiency at grades 5, 6, and 7 among African American students has, in general, been declining slightly over the past three years. Grade 8 reading is declining slightly overall, but it seems mainly to be attributable to declines this year among Asian students and to a lesser extent Hispanic

students. While grade 10 reading has increased slightly over the years, there has not been improvement among African American students.

Math

At grade 3, math scores have been highly variable across student subgroups and are relatively unchanged over the past three years. Math scores among grade 4 students have raised steadily among ELL, low income, and Hispanic student subgroups over the past several years. Grade 5 math scores increased slightly over the previous year across most student subgroups. The exception was among Hispanic and ELL students who declined slightly, but the performance this year was still higher than two years ago. Grade 8 and 10 math performance among non-low income and white student subgroups remains high.

Math scores for grades 6, 7, 8, and 10 were most adversely affected by declines among the African American, Hispanic, and Asian (Grade 6 and 8 only, not Grade 7 or 10) student subgroups.

Achievement Gap

A key goal of the MMSD is to eliminate the achievement gap between economically disadvantaged students and those who are not economically disadvantaged. The gap in the percentage of students scoring proficient and advanced across these two socio-economic groups was decreased in three of the seven grades tested in mathematics between 2006-07 and 2007-08. In reading this gap was reduced in four of the seven grades tested. For this year, grade 10 was the only grade where the gap decreased in both subject areas. The gap decreased by 5 points in reading and 2 points in math.

Particularly strong improvements have been made in reducing this achievement gap in certain grade levels. In grade 8, the gap over the past six years between economically disadvantaged and non-economically disadvantaged students has declined by 12 percent in both reading and math. The gap decrease was attributable to increases in economically disadvantaged student proficiency improvements, and not to any declines among the non-economically disadvantaged student group