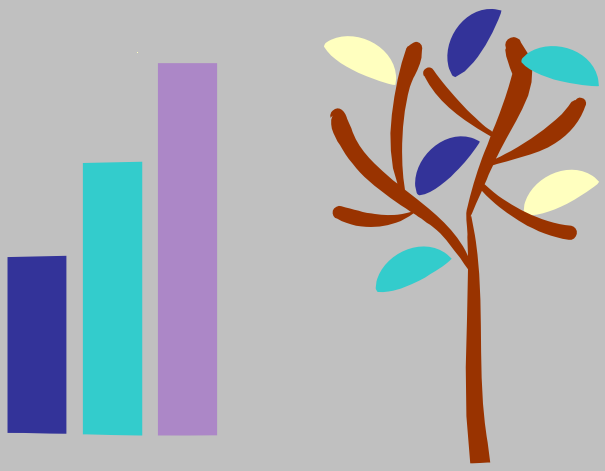
Milwaukee Academy of Science

Programmatic Profile and Educational Performance

2013–14 School Year

Report Date: September 2014



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EXECUTIVE SUMMARY
for
Milwaukee Academy of Science
2013–14

This is the sixth annual report to describe the operation of the Milwaukee Academy of Science (MAS) as a City of Milwaukee–chartered school. It is a result of intensive work undertaken by the City of Milwaukee Charter School Review Committee (CSRC), school staff, and the NCCD Children's Research Center (CRC). Based on the information gathered and discussed in the attached report, CRC has reached the following findings.

I. CONTRACT COMPLIANCE SUMMARY[1]

Beginning in 2012–13, the Wisconsin Department of Public Instruction (DPI) applied more rigorous proficiency-level cut scores to the Wisconsin Knowledge and Concepts Examination (WKCE) reading and math tests. These revised cut scores are based on standards set by the National Assessment of Educational Performance (NAEP) and require students to achieve higher scale scores in order to be considered proficient. The school's contract compliance is based on standards set using the former WKCE cut scores; therefore, the compliance summary below reflects the school's compliance to only those standards.

One provision was substantially met and one was partially met.

A. Provision substantially met: Not all ninth through twelfth graders took the required standardized tests.[2]

B. Provision partially met: Eleventh-grade students below benchmarks on the PLAN. Fewer than 60% of students below benchmark on some of the PLAN subtests reached benchmark or gained at least one point on the same subtest or composite score on the ACT.[3]

C. Provisions not met:

1. Two of the instructional staff did not hold a DPI license or permit.[4]

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[1] See Appendix A for a list of each education-related contract provision, page references, and a description of whether each provision was met.

[2] All ninth graders completed the EXPLORE. Of 48 tenth graders, 46 completed the PLAN; one of the two that did not take it withdrew two days after the test. Of 39 eleventh graders, 38 completed the ACT by June 2014; one student signed up twice but did not complete the test. Of 21 twelfth graders, 20 completed the ACT, but not all 20 took it in the fall; the student who did take the ACT signed up three times but never completed it.

[3] More than 60% of students showed progress on the English, math, and reading subtests from the fall to spring; 59% of students showed progress on the composite score. Only 39.5% of students showed progress on the science subtest.

[4] A math teacher in the high school and a science, technology, engineering, and math teacher did not have a DPI license. Both teachers had applied to DPI for a license but the applications did not include all the necessary materials, so licenses were not granted before the end of the school year.

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2. MAS met all but four of the educational provisions in its contract with the City of Milwaukee and subsequent CSRC requirements. The school did not meet the following provisions.

- That at least 75% of students at or above the benchmark for any of the EXPLORE subtests or the composite score will maintain benchmark on the PLAN. Only 66.7% of the students at or above the EXPLORE English benchmark maintained benchmark on the PLAN. Too few students were at or above the math, reading, science, and composite benchmarks to include results in this report.

- That at least 75.0% of students at or above the benchmark for any of the PLAN subtests or the composite score will maintain benchmark on the ACT. Only 41.2% of students at or above the PLAN English benchmark maintained benchmark on the ACT. Too few students were at or above the math, reading, science, and composite benchmarks to include results in this report.

- That more than 60.0% of students below proficient on the WKCE in reading show advancement (actual: 39.7% of 73).

- That more than 60.0% of students below proficient on the WKCE in math show advancement (actual: 44.2% of 95).

II. PERFORMANCE CRITERIA

A. Local Measures

1. Primary Measures of Educational Progress

CSRC requires each school to track student progress in reading, writing, mathematics, and individualized education program (IEP) goals throughout the year to identify students in need of additional help and to assist teachers in developing strategies to improve the academic performance of all students.

This year, MAS's primary local measures of academic progress resulted in the following outcomes.

Primary/Elementary Academy Grades (K4 Through Fifth)

- Of K4 students, 64 completed the fall and spring Phonological Awareness Literacy Screen (PALS) PreK assessments; at the time of the spring test, 95.3% of those students were at or above the developmental range for five or more of seven completed tasks. The school's goal was 85.0%.

- Of K5 students, 71 completed the fall and spring PALS-K assessments; most (94.4%) of those students were at or above the spring summed-score benchmark. The school's goal was 85.0%.

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- Of first through fifth graders, 334 completed the fall and spring Measures of Academic Progress (MAP) reading tests. Overall, 71.6% of those students showed progress on the spring test. The school's goal was 70.0%.

- Of K4 and K5 students, 130 completed fall and spring assessments based on the SRA Real Math curriculum. Most (89.2%) of those students acquired at least 80.0% of the math competencies designated as benchmarks. The school's goal was 80.0%.

- Of first through fifth graders, 334 completed the fall and spring MAP math tests. Overall, 76.6% of those students showed progress on the spring test. The school's goal was 70.0%.

- Of 189 third- through fifth-grade students assessed in writing, 73.5% achieved a score of 12 or more points, just short of the school's goal of 75.0%.

- Of 49 primary/elementary academy students with IEP goals reviewed during the year, 85.7% met one or more of their goals this year. The school's goal was 80.0%.

Junior Academy (Sixth Through Eighth Grades)

- Of sixth through eighth graders, 203 completed the fall and spring MAP reading tests. Overall, 78.8% of those students showed progress on the spring test. The school's goal was 70.0%.

- Of sixth through eighth graders, 203 completed the fall and spring MAP math tests. Overall, 76.4% of those students showed progress on the spring test. The school's goal was 70.0%.

- A total of 210 sixth- through eighth-grade students were assessed in writing and achieved an average score of 20.1 points. The school's goal was an average of 18 points.

- Of 23 junior academy students with IEP goals reviewed during the year, 92.0% met one or more of their goals this year. The school's goal was 80.0%.

High School (Ninth Through Twelfth Grades)

- EXPLORE and PLAN reading and English progress

  » Of ninth graders, 62 took the EXPLORE reading and English tests in the fall and spring of the school year. At the time of the spring test, 38 (61.3%) had reached the English benchmark or improved at least one point on the English test, and 39 (62.9%) had reached the reading benchmark or improved one point from fall to spring on the reading subtest. Overall, 50 (80.6%) students improved in English or reading.

  » Of tenth graders, 34 took the PLAN reading and English tests in the fall and spring of the school year. At the time of the spring test, 30 (88.2%) had

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reached the English benchmark or improved at least one point on the English test, and 22 (64.7%) had reached the reading benchmark or improved one point from fall to spring on the reading subtest. Overall, all 34 students improved in English or reading.

» The school's goal was 70.0%.

- Of eleventh and twelfth graders who completed fall and spring Scholastic Reading Inventory assessments, 60 improved, on average, 56.3 Lexile points between tests. The school's goal was 13 points.

- EXPLORE and PLAN math

  » Of ninth graders, 62 took the EXPLORE math subtest in the fall and spring of the school year. At the time of the spring test, 35 (56.5%) had reached the math benchmark or improved at least one point from fall to spring.

  » Of tenth graders, 34 took the PLAN math subtest in the fall and spring of the school year. At the time of the spring test, 19 (55.9%) had reached the math benchmark or improved at least one point from fall to spring.

  » The school's goal was 55.0%.

- Of eleventh and twelfth graders, 57 completed final math assessments for the math course in which they were enrolled; just over half (52.6%) of those students scored 70% or better on the end-of-year assessment. The school's goal was 65.0%.

- High school students scored, on average, 18.8 points on a teacher-assessed writing sample. The goal for high school students was 18 points.

- Of 16 high school students with IEP goals reviewed during the year, 87.5% met one or more of their goals this year. The school's goal was 80.0%.

- Graduation plans were developed for all 159 high school students enrolled at the end of the school year. The school's goal was to develop a plan for all students.

- Ninth graders earned an average of 5.9 credits; tenth graders accumulated an average of 13.0 credits; eleventh graders accumulated an average of 19.8 credits; and twelfth graders accumulated, on average, 26.6 credits. There were 126 (79.7%) students who were promoted to the next grade or who graduated from high school this year.

2. <u>Secondary Measures of Educational Outcomes</u>

To meet City of Milwaukee requirements, MAS identified measurable outcomes in the following secondary areas of academic progress.

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- Attendance
- Parent participation
- Special education student records
- Testing of new enrollees
- High school graduation plans

The primary/elementary and junior academies met all three of their internal goals (attendance, parent participation, and special education student records). The high school met four of their five internal goals.[5]

3. CSRC Scorecard

The school scored 72.2% for K4–8 and 78.1% for the high school on the CSRC scorecard when former WKCE cut scores were applied. The weighted overall score was 73.3%.

B. Year-to-Year Academic Achievement on Standardized Tests

The following summarizes year-to-year achievement based on standardized test scores.

- Of 195 fourth through eighth graders, 86.7% maintained proficiency in reading and 91.3% of 173 students maintained proficiency in math, based on former proficiency-level cut scores used up until the 2012–13 school year. The CSRC goal is 75.0%.

- Of 73 fourth- through eighth-grade students who were below proficient in reading, 39.7% showed improvement, while 44.2% of 95 students who were below proficient in math showed improvement. The CSRC goal is 60.0%.

- EXPLORE to PLAN: There were 33 students who took the EXPLORE in the fall of 2012 as ninth-grade students and the PLAN in the fall of 2013 as tenth graders. CRC examined progress for students who were at or above the EXPLORE benchmarks and for those who were below benchmark at the time of the fall 2012 EXPLORE.

  There were 15 (45.5%) students at or above the EXPLORE English benchmark; 10 (66.7%) of those students remained at or above the PLAN English benchmark. The CSRC goal is 75.0%. Due to the small number of students at or above the math, reading, and science benchmarks or the composite score, progress for those students could not be reported.

[5] The high school met the parent participation, special education student records, testing of new enrollees, and graduation plan goals but did not meet its internal goal for attendance.

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Students Below Benchmark

» Of the 18 students below the English benchmark on the fall of 2012 EXPLORE, 15 (83.3%) reached the PLAN benchmark or improved their scores at least one point.

» Of the 27 students below the EXPLORE math benchmark, 18 (66.7%) reached the PLAN benchmark or improved their scores by at least one point.

» Of the 26 students below the EXPLORE reading benchmark, 19 (73.1%) reached the PLAN benchmark or improved their scores at least one point.

» Of the 30 students below the EXPLORE science benchmark, 19 (63.3%) reached the PLAN benchmark or improved their scores at least one point.

» Of the 28 students who received a composite score of less than 17 on the EXPLORE, 23 (82.1%) achieved a score of 18 or higher on the PLAN or improved their composite scores by at least one point.

The CSRC expectation is that at least 60.0% of students will progress on each subtest and the composite score from the EXPLORE to PLAN. The school has therefore met the goal for each subtest and the composite score.

- PLAN to ACT: There were 52 students who took the PLAN in the fall of 2011 or 2012 as tenth graders and the ACT during 2013–14 as eleventh or twelfth graders. CRC examined progress for students who were at or above benchmark as well as those who were below benchmark at the time of the fall PLAN in 2011 or 2012.

  Students at or above benchmark: Seven (41.2%) of 17 students at or above the PLAN English benchmark maintained benchmark on the ACT. The CSRC goal is 75.0%. Due to the small number of students at or above benchmark on the PLAN math, reading, and science subtests and the composite score, progress could not be reported.

  Students Below Benchmark

  » Of the 35 students below the English benchmark on the PLAN, 24 (68.6%) reached the ACT benchmark or improved their scores at least one point.

  » Of the 48 students below the PLAN math benchmark, 29 (60.4%) reached the ACT benchmark or improved their scores by at least one point.

  » Of the 45 students below the PLAN reading benchmark, 30 (66.7%) reached the ACT benchmark or improved their scores at least one point.

  » Of the 52 students below the PLAN science benchmark, 24 (46.1%) reached the ACT benchmark or improved their scores at least one point.

  » Of the 47 students who received a composite score of less than 18 on the PLAN, 28 (59.6%) achieved a score of 21 or higher on the ACT or improved their composite scores by at least one point.

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The CSRC expectation is that at least 60.0% of students will progress on each subtest and the composite score from the PLAN to ACT. The school has met the goal for the English, math, and reading subtests but not the science subtest or the composite score.

III. SURVEY/INTERVIEW RESULTS

Every other year, CRC conducts parent surveys and interviews board members, teachers, and students to obtain feedback on their perceptions about the school. Some of the key results include the following.

- There were 200 surveys, representing 241 (42.0%) of 574 families, completed.
  - » Most (90.0%) parents would recommend this school to other parents.
  - » A majority of parents (86.8%) rated the school's overall contribution to their child's learning as "excellent" or "good."
- Of the 19 board members, 17 (89.5%) participated in interviews.
  - » Most (94.1%) rated the school as "excellent" or "good" overall.
  - » The main suggestions made by board members for improving the school were to develop strategies to enable the school to raise more resources to meet the needs of students; find better ways to involve more parents in the school and students' learning processes; and undertake the task of creating a "first grade strategic plan," including reviews of the school's mission and philosophy and determining the school's short- and long-term focus.
- Of the 77 instructional staff, 17 participated in interviews.
  - » Five (29.4%) teachers listed the school's progress toward becoming an excellent school as "excellent," and eight (47.0%) listed the school's progress as "good."
  - » Seven (41.2%) rated the students' academic progress as "excellent" and the remaining 10 (58.8%) rated the contribution as "good."
- There were 24 randomly selected eighth-, eleventh-, and twelfth-grade students interviewed.
  - » All (100%) who responded indicated they had improved in reading and 87.5% improved in math at the school;
  - » There were 23 (95.8%) who said they felt safe in school; and
  - » A total of 11 (91.6%) of the 12 high school students planned to go to college.

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IV. RECOMMENDATIONS FOR SCHOOL IMPROVEMENT

The school addressed all of the recommendations in its 2012–13 programmatic profile and educational performance report. To continue a focused school improvement plan, CRC reviewed MAS's academic achievement data for the last school year and solicited input from school staff to formulate these recommendations for the 2014–15 year.

For the Primary/Elementary Academy

- Streamline the Response to Intervention (RtI) process so that it is more focused and uses more precise interventions. Leadership should also set benchmarks for students and monitor their achievement of these goals.
- Work collaboratively with teaching staff to align all of the curriculum with the Common Core State Standards and increase the rigor within each classroom.
- Seek out feedback from parents on how to increase parental involvement in their children's learning.

For the Junior Academy

- Work collaboratively with teaching staff to align/map the science and social studies curriculum to be consistent with the Common Core standards as part of the efforts to increase the rigor of the curriculum in these two study areas.
- Allocate additional support/resources to reading and math classroom teachers so they can better focus on differention of their students and provide more instructional time to the lowest achievers.

For the High School

- Work collaboratively with teaching staff to design more appropriate local assessments that align with the Common Core standards, College and Career Readiness Standards, and the rigor of the ACT series.
- Strengthen data-driven instructional practices as they relate to each general classroom and RtI implementation.
- Research and implement additional proven strategies to improve student attendance and engagement in educational endeavors. Additional steps should also be taken to reduce the amount of time students are suspended from school.

V. RECOMMENDATION FOR ONGOING MONITORING

This is MAS's sixth year as a City of Milwaukee Charter School. Due to the school's contract compliance status and combined scorecard rating of 73.3%, CRC recommends that the school continue regular, annual monitoring and reporting.[6]

[6] The K–8 scorecard rating was 72.2% and the high school's was 78.1% when the former WKCE cut scores were used.

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I. INTRODUCTION

This is the sixth regular program monitoring report to describe educational outcomes for the Milwaukee Academy of Science (MAS), a school chartered by the City of Milwaukee.[7] This report focuses on the educational component of the monitoring program undertaken by the City of Milwaukee Charter School Review Committee (CSRC) and was prepared as a result of a contract between CSRC and the NCCD Children's Research Center (CRC).[8]

CRC used the following steps to gather the information in this report.

- Three initial site visits were conducted, wherein CRC conducted a structured interview with the primary/elementary academy, the junior academy, and the high school leadership staff; revised critical documents; and obtained copies of these documents for CRC files.
- CRC staff assisted the school in developing outcome measures for three distinct learning memorandums.
- CRC staff made additional scheduled and unscheduled site visits to observe classroom activities; student-teacher interactions; parent-staff exchanges; and overall school operations, including the clarification of necessary data collection. CRC staff also reviewed a representative sample of special education files.
- CRC staff, along with the chair of the Charter School Review Committee attended a meeting of the Board of Directors of this school to improve communications regarding the role of the CSRC and CRC, as the educational monitor and the expectations regarding board member involvement.
- At the end of the school year, CRC conducted structured interviews with the primary/elementary academy, junior academy, and high school leadership teams.
- CRC staff conducted interviews with a random selection of students and teachers. All members of the school's board of directors were contacted for interviews and interviews were conducted with all respondents.
- CRC conducted a survey of parents of all students enrolled in the school.
- The school provided electronic data to CRC, which CRC compiled and analyzed.

[7] MAS initially opened in August 2000 and was chartered by the University of Wisconsin (UW)–Milwaukee. In July 2008, the school entered into a five-year charter agreement with the City of Milwaukee. A second five-year contract was signed with MAS during the 2012–13 school year and started with the 2013–14 school year.

[8] CRC is a nonprofit social science research organization and a center of the National Council on Crime and Delinquency (NCCD).

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II. PROGRAMMATIC PROFILE

Milwaukee Academy of Science
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Telephone: (414) 933-0302
Website: http://www.milwaukeeacademyofscience.org

President and Chief Executive Officer: Judy Merryfield
Associate Principal, Kindergarten Through Fifth Grade: Jacqueline DeJean
Associate Principal, Sixth Through Eighth Grade: Kristi Bachar
Associate Principal, Ninth Through Twelfth Grade: Darrell Woodard

A. Description and Philosophy of Educational Methodology

1. Mission and Philosophy

According to the MAS website:

> The mission of the Milwaukee Academy of Science, an exemplary leader in innovative science education that maximizes the potential of each young mind, is to graduate urban students prepared to compete successfully in science at the postsecondary level, by providing a rigorous 21st century curriculum taught by master educators in collaboration with students, families, staff, and the community.

MAS opened in August 2000 and was chartered by UW–Milwaukee. The school began a five-year charter agreement with the City of Milwaukee in July 2008. MAS started its second five-year charter agreement during the 2013–14 school year. The school serves students in K4 through twelfth grades with a challenging curriculum that emphasizes science. MAS staff embrace the "5 E" model of teaching science: Engage, Explore, Explain, Evaluate, Extend. MAS enhances its curriculum with community partnerships to offer its students unique science opportunities.

MAS complements its mission by operating under the following guiding principles.

- All human beings have equal, intrinsic worth.
- Every individual is unique and has an unlimited capacity for learning.

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- In a changing world, a passion for lifelong learning is crucial for reaching one's full potential.
- Personal success is achieved through high expectations, hard work, and perseverance.
- As individuals mature, they become increasingly more responsible for their choices and behavior.
- Everyone benefits when people willingly contribute to the well-being of their community.
- A quality education requires the collaborative effort of devoted and enthusiastic students, family, staff, and community.
- Integrity is essential for building and sustaining a strong, supportive community.
- Diversity of experience and culture strengthens understanding and enriches life.
- The understanding and application of science prepares individuals for the complexities of the 21st century.

2. Instructional Design

MAS emphasizes the integration of science into the general curriculum. It also provides its students with unique science opportunities at all levels. The school's overall objectives, as stated in the 2013–14 parent, student, and teacher handbooks, are threefold.

- All students who are enrolled at MAS for three or more years will meet or exceed grade-level standards in reading, writing, and mathematics.
- All MAS graduates will demonstrate 21st-century skills necessary to make a successful transition to postsecondary education in science.
- Each student will design and complete challenging, meaningful science projects or experiences tailored to their interests, abilities, and aspirations.

As part of the school's efforts to achieve these objectives, MAS teachers are trained in differentiated instruction as well as the curricular areas in which they teach. Teachers use a variety of instructional groupings, including one-on-one instruction, small-group instruction, cooperative

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learning, whole-group instruction, and independent study. MAS used additional grade-level teachers to assist first- through eighth-grade classroom teachers. These assistants worked under the supervision of the classroom teachers to provide supplemental instructional support to small groups in reading and math. Teachers may also team teach, which commonly occurs in inclusion classrooms with the regular education teacher and the special education teacher. The school's professionals use direct and indirect instruction methodologies, project-based learning, computer-based learning, interactive learning techniques, and experiential learning opportunities. The needs of the students and the objectives of the lessons determine the most appropriate instructional techniques.[9]

The school's curriculum is challenging and designed to meet the needs of individual learners. Open Court Reading, a research-based program with proven ability to accelerate reading skills with urban students, is used as the core reading program for the primary/elementary academy. The junior academy is departmentalized and classes are taught by content-area specialists. All students have a double reading block using Holt Elements of Literature; independent reading of self-selected novels; and other instructional strategies, including Compass Learning. The high school students also use Holt Elements of Literature as a foundation text. Teachers supplement this curriculum through the use of novels and techniques such as literature circles. The junior academy science curriculum focuses on the life sciences with an emphasis on both biology and environmental science. All high school students take biology, physical science, chemistry, technological inquiry, and physics. In addition to these science requirements, high school students have access to things such as advanced placement courses in biology and environmental science and classes in anatomy and physiology, vertebrate zoology, and engineering.

[9] This information was taken from the school's city charter application.

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The primary/elementary and junior academy used the Measures of Academic Progress (MAP) to assess student progress in reading. Both programs used Compass Learning and the Scholastic Reading Inventory (SRI) to assess and monitor students' acquisition of higher-level reading skills.[10]

For math, MAS uses the SRA Real Math curriculum for the primary/elementary academy students. A Common Core-aligned Holt curriculum is used for the junior academy students, with the focus for eighth graders on algebraic concepts. The high school math program allows students to progress through courses in Algebra I, Geometry, and Algebra II/Trigonometry; Precalculus or Statistics; and potentially Calculus. More advanced courses are provided based on student needs.

Students start their science learning at the youngest ages by focusing on themes aligned with their reading series. The science curriculum draws on the McGraw-Hill series for K4 through fifth grade. The junior academy students use Science Plus, an active, hands-on curriculum based on the Constructivist Learning Model, which encourages students to build their own understanding of science. The older students' math and science curriculum has been strengthened by focusing on the concepts emphasized in the Common Core instructional shifts and the competencies embedded in the EXPLORE, PLAN, and ACT.

Finally, MAS recognizes the importance of "specials" in a student's academic program, so each student receives instruction in art and physical education on a regular basis. A decision was made in the 2011–12 school year to drop music instruction and replace it with a technology laboratory option.

[10] Compass Learning is a computer-based program that matches learning activities to students' scores on MAP.

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B. School Structure

1. Board of Directors

MAS is an unincorporated association governed by the Milwaukee Science Education Consortium, a 501c(3) organization. The consortium is governed by a board of directors. It has ultimate responsibility for the school's success and is accountable directly to the City of Milwaukee and the Wisconsin Department of Public Instruction (DPI) to ensure that all of the terms of its charter are met. The board sets policy for the school and hires the school president and CEO, who, in turn, hires the staff of the school. The board has regular meetings where issues are discussed, policy is set, and school business is conducted.[11]

This year, there were 19 members on the board of directors: a president, vice president, treasurer, and 16 other members.[12] Board members represent each of the institutions of higher education that contributed to the creation of the consortium (Medical College of Wisconsin, Cardinal Stritch University, Marquette University, Alverno College, Milwaukee Area Technical College, Milwaukee School of Engineering, and UW–Milwaukee). Other board members represent major local businesses and contribute their expertise in administrative and fiscal management. Board members reflect a variety of experience and expertise, including educational administration, accounting, nonprofit leadership and management, law, development/construction, marketing/fundraising, and teaching, as well as a parent representative.

This year, CRC conducted phone interviews with 17 (89.5%) of the 19 board members who responded to a request for feedback, 11 of whom said they participated in strategic planning for the school. All respondents received a presentation on the school's annual academic performance report, received and approved the school's annual budget, and reviewed the school's annual financial audit.

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[11] This information is taken from the school's website and its original application to the City of Milwaukee.

[12] There are four other members of emeritus status.

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Nearly all (94.1%) rated the school as "excellent" or "good" overall. When asked, the main suggestions made by board members for improving the school were as follows.

- The board needs to develop additional strategies to enable them to raise more resources so that the school can better meet student needs. This will require better marketing of the school, including better communication of the school's positive achievements.
- The board and staff need to find better ways to involve more parents in the school and in their students' learning processes.
- The school needs to undertake the task of creating a "first grade strategic plan," including the commitment to take a hard look at the school's mission and philosophy and determine the school's short- and long-term focus.

2. Areas of Instruction

MAS administration is structured to support the ongoing improvement of the learning environment and academic achievement of all its students. The school has a president/CEO, director of business services, operations coordinator, director of external relations, and director of development who are responsible for the overall school and its academic and financial outcomes. Three associate principals, assisted by four achievement directors, oversee MAS's three academies: the primary/elementary academy, the junior academy, and the high school. The academies are assisted with their core instructional activities by student support, special education, intervention staff, specialist, and technology teams.

The primary/elementary academy serves students in K4 through fifth grade; the junior academy serves students in sixth through eighth grades, and the high school serves students in ninth through twelfth grades.

A major part of the school's overall strategic plan is to identify 21st-century skills, integrate them throughout the K4 through twelfth-grade curriculum, and develop appropriate means for assessing and improving students' academic performance. In the earliest grades (K4 through third),

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instruction focuses primarily on the acquisition of literacy and mathematical skills. At these early ages, students are also introduced to science, social studies, technology, and the fine arts. As students progress into the next two grades in the primary/elementary academy, the curriculum expands its focus to encompass additional instructional time on scientific constructs and social studies material, but special attention continues to be given to the acquisition of all age-appropriate literacy and mathematical skills.

Students in the junior academy and high school receive instruction in language arts, writing, reading, literature, mathematics, technology, social studies, science, foreign languages, art, and physical education. Grade-level standards and benchmarks have been established for each of these curricular areas; progress is measured against these standards for each grade level. The junior academy is departmentalized in every subject area. In an effort to better prepare students for the high school experience, they move from classroom to classroom for their content instruction. These practices maximize the teachers' expertise and enable them to operate more effectively as "teacher teams." Most recently, high school students were given expanded opportunities to participate in advanced placement classes and other more advanced courses. In order to graduate from MAS, students must acquire 22 credits.[13] The minimum credit requirements for graduation are as follows.

- English 4.0
- Mathematics 4.0
- Social studies 3.0
- Science 5.0
- Foreign language 2.0
- Physical education/health[14] 2.0
- Electives 2.0

[13] These graduation requirements will be upgraded and become more rigorous for students who graduate in 2017. Students in this class will need four and a half credits in English, six credits in science, and two and a half elective credits.

[14] Must include one and a half credits in physical education and half a credit in health.

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These requirements may vary for students with special education needs depending upon their individualized education program (IEP) goals and their transition plan.

In order to participate in the graduation ceremony, students must take the ACT during their junior year and during their senior year, maintain an 85.0% attendance rate, and have no outstanding fees.[15]

During the interview and survey process, board members, teachers, and parents were asked about the school's program of instruction. Three quarters (76.4%) of board members, 91.3% of parents, and 64.7% of teachers who responded rated the program of instruction as excellent or good.

3. Teacher Information

MAS is on 2.5 acres of land. The primary/elementary and junior academies occupy a three-story-plus-basement building, while the high school occupies two stories of the 12-story attached "tower" building and new classrooms on the first floor. The school has a gymnasium on the north side of the building, which is currently used by all students. At the beginning of the 2013–14 academic year, MAS had 25 primary/elementary academy, 18 junior academy, and 15 high school classrooms. Numerous additional rooms are available for art, computer labs, libraries, science labs, resource areas, engineering labs, and conference rooms.

Classrooms were staffed by 38 primary/elementary academy teachers and grade-level teachers, 11 junior academy teachers, and 14 high school teachers. These classroom teachers were supported by a special education coordinator, eight special education teachers; three intervention teachers; two science, technology, engineering, and mathematics (STEM) teachers; two physical education instructors; and a computer technology specialist. Other educational support staff included a guidance counselor for ninth- through twelfth-grade students, a three-person student support team,

[15] This requirement is articulated in the 2013–14 *Student and Parent High School Handbook*.

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and a three-person technology team that included a librarian. In addition to the president/CEO, the school's administrative staff included a director of business service, director of external relations, director of development, an operations coordinator, three associate principals, four achievement directors, four office staff, and three security staff.[16]

At the beginning of the year, 26 (33.8%) of the 77 instructional staff were newly hired. The other 51 (66.2%) teachers returned from the 2012–13 school year and had been at the school for one to nine years. The overall return rate from the 2012–13 to 2013–14 school year for eligible instructional staff was 86.9%.[17] During the 2013–14 school year, one (1.3%) teacher left the school prior to the end of the school year, resulting in an annual school year teacher retention rate of 98.7%. By the end of the 2012–13 school year, the instructional staff had been teaching at the school for an average of 3.4 years.

Two (2.6%) of the 77 instructional staff employed during the year did not hold a Wisconsin DPI license or permit to teach.[18]

MAS believes that staff members are accountable for their own professional growth and development. Professionals are expected to accept the responsibility for their development both collectively and individually. Expectations include the following.

- Teachers should create personal professional development plans and portfolios.
- Designated teams assess their common professional development needs.
- Staff attendance is mandatory on professional development days.

[16] MAS contracted with the Milwaukee Center for Independence for all food service.

[17] This rate was calculated excluding the teachers who were at MAS at the end of the 2012–13 school year but who were not offered contracts for the 2013–14 school year, either due to unacceptable performance or the elimination of their instructional position. Two of the returning teachers were given promotions to administrative positions at the MAS so they did not return to the teaching staff.

[18] A high school math teacher and junior academy STEM teacher did not have a DPI license. Both teachers had applied to DPI for their licenses but neither had submitted all of the required materials, so these two teachers were not granted licenses by the end of the school year.

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The school supports professional development through its preservice training as well as ongoing professional development opportunities. Staff members are provided with in-house support and multiple opportunities to grow as professionals.[19] The school maintains a comprehensive induction program for initial (new) educators. Components include:

- Orientation program prior to the start of the school year;
- Professional development plan reviewers on staff;
- Membership in the Southeastern Wisconsin New Teacher Project, which includes regular mentor/new teacher seminars;
- New teacher group moderated by the principals;
- Strong, cohesive teams; and
- Principal observations.

All staff members are required to participate in professional development programs and are provided time for collaborative planning and departmental meetings. In addition, teachers are encouraged to attend relevant conferences and workshops. For example, some of the K4 through eighth-grade staff attend the Wisconsin State Reading Association Conference each year.

Formal teacher evaluations occur on an annual basis and are used to guide decisions about contract renewals and salaries for the next school year. Assessments/evaluations of MAS teaching staff are based on the employee's commitment to his/her personal professional development and evidence of progress, as well as school budgetary constraints.

During the interview process, teachers were asked about professional support and professional development opportunities; 14 (82.3%) of the 17 teachers indicated that the professional

[19] The material in this section was extracted from MAS's application to the city to be authorized as a charter school in July 2008, pages 24 and 25, and the *2013–14 Staff Handbook*.

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support given to them was excellent or good. Similarly, 11 (64.7%) teachers rated professional development opportunities as excellent or good.

4. Hours of Instruction/School Calendar[20]

For primary/elementary and junior academy students, the regular school day began at 7:55 a.m. and ended at 3:20 p.m. High school students began their day between 7:40 and 9:00 a.m. and ended their day between 3:00 and 3:51 p.m. Breakfast was available to all students beginning at 8:31 a.m.

The first day of student attendance was August 12, 2013, and the last day was June 13, 2014. There were 178 student attendance days. The school held an open house for families on August 8, 2013, from noon until 4:00 p.m.

MAS offers students regular opportunities for afterschool activities and academic support. For primary/elementary students, afterschool activities—such as science club, Boy and Girl Scouts, reading tutoring, and sports—are held from 3:30 to 5:00 p.m. This year, MAS partnered with Milwaukee Succeeds to implement an intense reading tutoring program for Kindergarten through second-grade students.[21]

MAS offered tutoring services, science club, robotics, athletics, etc. to junior academy students from 3:20 until about 4:30 p.m. Other activities were available for these youth and their high school peers during this same time period.[22] The learning lab was available for all high school students both before (7:00 to 8:31 a.m.) and after (3:00 to 6:00 p.m.) school. The lab was staffed by high school

[20] All information in this section is available in the school calendar; MAS provided CRC with a copy of the school calendar at the beginning of the school year.

[21] The Milwaukee Journal Sentinel reported on this project in some detail in the paper on June 23, 2014. Initial results have been quite positive and promising.

[22] Activities included things such as science club; job/career club; basketball; fitness; cheerleading; dance; career club; self-defense; and Pearls for Teen Girls, Inc.

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teachers and provided a place for students to complete general studying, independent reading, research on the computer, ACT preparation, and assessments or assignments, or obtain enrichment instruction. MAS strongly encouraged students with the greatest needs to participate in the learning lab.

5. Parental Involvement

MAS recognizes that parent/family involvement is a critical component of student success. The school encourages and solicits the engagement and involvement of parents in the following ways.

- MAS requires all parents to attend a mandatory registration meeting at the beginning of the school year. At this session, staff review the appropriate student/parent handbook. Subsequent to this review, parents and older students sign an agreement to follow the school's policy and procedures.
- MAS employs two deans of students who are expected to work with parents/families to ensure that children are coming to school regularly. It is also their responsibility to provide parents with regular and diverse opportunities to participate in school functions.
- MAS seeks regular communication with its families by having each grade level send out newsletters. These newsletters highlight upcoming school activities and describe recent student achievements and school awards. Teachers are also encouraged to communicate with parents on a regular basis via written notes, telephone, and/or email as well as to be prepared to meet with parents during parent/teacher conferences.[23]

The school also has a parent action team, which holds meetings once each month. All parents are members of this organization and are encouraged to participate so that the team can achieve its mission, which is to make MAS the best school in Milwaukee. The team provides parents with an additional link to teachers; bridges communication between parents, school, students, and teachers;

[23] This information was extracted from MAS's charter school application and the *Student and Parent High School Handbook*.

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helps to develop students as lifelong learners; provides leadership for the school community; and raises funds for school programs and projects.

Teachers, parents, and board members were asked about parental involvement. About two thirds (64.7%) of board members and all of the teachers rated parental involvement as good or fair; none rated it as excellent. A majority (87.1%) of parents indicated that the opportunity for parent involvement with the school was excellent or good, and 94.7% indicated that opportunities for parental participation were an important reason for choosing MAS.

6. Waiting List

According to the school's administrators, the school did not have a waiting list as of May 2014. They anticipated a waiting list might develop over the summer for certain grades, but staff did not expected the number of students to be significant.

7. Discipline Policy

MAS places a strong emphasis on a safe and orderly learning environment. The school has adopted a "Code of Conduct," which reads as follows.

> At the Milwaukee Academy of Science,
> I will respect myself,
> respect my school staff,
> respect my fellow students,
> and respect my school.

In the parent handbooks, the school emphasizes its commitment to creating and maintaining a positive learning environment that promotes cooperation, fosters creativity, and encourages and nurtures students to take risks involved in learning. MAS believes parents and community members play a critical role in supporting this learning environment through the use of common, respectful

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language that inspires students while setting clear limits. These partners are encouraged to discuss the school's code of conduct with children.

The parent handbooks also contain detailed information about MAS's discipline code and what MAS considers to be level 1, 2, and 3 violations. It provides clear and concrete descriptions of the range of disciplinary consequences that will be used by MAS staff. The handbooks identify each type of consequence, describe each consequence in some detail, indicate who can assign the consequence, and associate each consequence with a set of violations. For example, a warning might be issued to a student with a level 1 violation, and expulsion is possible for a level 3 violation.

MAS also uses strategies consistent with good response to intervention (RTI) practices. RTI is a framework for implementing high-quality instruction, balanced assessment, and collaboration using a multi-tiered system to provide the support to increase success for all students. MAS's RTI has three tiers for both academics and behaviors. Each tier contains detailed information about the school's expectations and the consequences for deviation from the expectations. Details about MAS's RTI can be found the 2013–14 parent handbook.

This year teachers, parents, and board members were asked about the discipline policy at MAS. The opinions expressed were favorable regarding discipline policy.

- Teachers
  - » A majority (88.2%) of teachers considered the discipline at the school as a "very important" or "somewhat important" reason for continuing to teach there.
  - » Over half (58.8%) rated the school's adherence to the discipline policy as good or excellent.
- Parents
  - » More than 90% of the parents considered discipline as a "very important" or "somewhat important" factor in choosing MAS.

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» Three quarters (73.5%) rated the discipline methods at the school as good or excellent.

» A slightly smaller percent of parents (68.1%) were comfortable with how the staff handle discipline.[24]

- Board Members: Of the 16 board members who knew about adherence to the discipline policy, 14 (87.5%) rated it as excellent or good.

8. Graduation Information

MAS's guidance department provides some assistance to the school's eighth graders, but the junior academy staff work throughout the year with these students and their parents and strongly encourage them to continue their education at MAS through high school graduation. The MAS leadership team indicated that most eighth graders continue at MAS for high school. At the end of the school year, 92.9% of the eight graders that were promoted to ninth grade were enrolled in MAS for the next school year. The remaining five students were enrolled in either another public system school or a public charter high school.[25] The reasons generally stated for students not returning to MAS for high school were the desire to participate in school athletics or to pursue interests other than science and/or engineering.

MAS employs a full-time guidance counselor whose primary responsibility is to work with the high school students as they prepare for postsecondary careers and educational experiences. As part of her work over the last school year, the counselor reported completing the following activities with MAS students.

All twelfth graders participated in a credit check and graduation progress meeting. A specific form was structured for use in these meetings so that each senior was aware of what was required of him/her in order to graduate at the end of the school year. During this session, each student identified

[24] Parents agreed or strongly agreed with the statement, "I am comfortable with how the staff handles discipline."

[25] Some of the schools chosen by MAS eighth-grade graduates include Rufus King, Hamilton, Riverside, and Tenor.

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the colleges and careers of greatest interest to him/her. Each senior had two subsequent individual meetings to review his/her progress toward graduation and movements for entry into colleges or a specific career field. The counselor also helped these students with ACT registration. Individual time was available to all seniors for assistance in filling out college applications, gathering the necessary documentation, calling universities to ask diverse questions, and sending out transcripts.

All ninth, tenth, and eleventh graders participated in at least one individual session to develop a graduation and career plan. The guidance counselor also assisted eleventh graders with the ACT registration process. Individualized sessions were complemented by a series of other activities provided by MAS to its high school students to increase their knowledge and ability to be more successful in their careers after graduation from high school. For example, multiple college admissions representatives spoke with students, representing UW–Green Bay, UW–La Crosse, Mount Mary, UW–Milwaukee, UW–Parkside, and UW–Oshkosh. Groups of students were taken on campus visits to UW–Whitewater and UW–Milwaukee. In addition to the campus tours, a group of students visited Mount Mary for the Wisconsin Educators Fair and advertised the National College Fair.

In addition to admission representative visits and college tours, the guidance counselor worked closely with the Great Lakes Foundation; a representative came and presented on various topics with each grade level. For example, some of the topics covered were types of financial aid (twelfth graders), starting to think about college early (ninth graders), and what to start doing in eleventh grade to prepare for the application process. The Great Lakes Foundation representative also made frequent visits to meet with seniors to assist them in completing the Free Application for Federal Student Aid (FAFSA).

The counselor partnered closely with the UW–Milwaukee Talent Search program. MAS's liaison made weekly visits to check in with students on various topics, primarily focusing on the college application process and assisting students from an early age. The liaison also was a huge asset in helping students complete the FAFSA and apply for grants/scholarships.

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The outcomes of these diverse activities were reported by the guidance counselor at the end of the school year. One outcome was that 19 (95.0%) of the 20 twelfth graders who graduated at the end of the school year were accepted into postsecondary schools, including Alverno College, UW–Milwaukee, Cardinal Stritch University, and the Milwaukee Area Technical College.[26, 27]

All 12 eleventh and twelfth graders interviewed at the end of the school year indicated that teachers had talked to them about college and 11 (91.7%) said that they were planning to attend college.

C. Student Population

As of September 20, 2013, 958 students were enrolled in K4 through twelfth grades.[28] During the year, 42 students enrolled in the school and 111 students withdrew.[29] Students withdrew for a variety of reasons. Of the primary/elementary academy students, nine withdrew due to behavior issues, eight moved, six were expelled, five withdrew due to transportation issues, seven withdrew for other reasons, and five withdrew for unknown reasons. Of the junior academy students, 11 were expelled, seven withdrew due to ongoing behavior issues, six moved, three transferred to other schools, one left due to attendance issues, and two left for other reasons. Of the high school students, 18 transferred to other public schools in Wisconsin, 13 were expelled for rules violations, four transferred out of state, three transferred to private schools, and three students withdrew for other reasons.

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[26] Two of these 19 students had made applications to schools but had not received acceptance letters by the end of the school year. The counselor reported that it was likely that both students would be accepted by the schools they selected.

[27] One student graduated but had to complete work during the summer program to get his/her diploma; the school did not report postsecondary plans for this student.

[28] There were 533 students in the primary/elementary academy, 231 in the junior academy, and 194 students in high school.

[29] A total of 29 students enrolled and 40 withdrew from the primary/elementary academy; seven enrolled and 30 withdrew from the junior academy; and six enrolled and 41 withdrew from the high school.

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There were 889 students enrolled at the end of the school year.

- There were 522 students in K4 through fifth grades (Figure 1), 208 in sixth through eighth grades, and 159 students in ninth through twelfth grades (Figure 2).
- Over half (475, or 53.4%) were girls and 414 (46.6%) were boys.
- There were 877 (98.7%) African American students, five (0.6%) Hispanic students, three (0.3%) Caucasian students, three (0.3%) Native American students, and one student was of an "other" race/ethnicity.
- There were 104 (11.7%) students with special education needs.[30] A total of 36 students had other health impairments (OHI), 26 had specific learning disabilities (SLD), 11 had speech and language impairments (SPL), 10 had emotional/behavioral disabilities (EBD) with OHI, seven had OHI and SPL, three had learning disabilities (LD), three had EBD, two had OHI with SLD, two had cognitive disabilities (CD), one student had CD with SPL, one had EBD with SLD, one had OHI with CD and SPL, and one student was autistic.
- Nearly all (97.0%) of the school's students were eligible for free/reduced lunch.[31]

[30] Includes students with identified special education needs who qualified and were not dismissed at evaluation.

[31] This percent is based on aggregate data provided by the school. The individual student free/reduced lunch data indicated that only 71.8% of students were eligible for free/reduced lunch but these data contained errors. The aggregate data is comparable to data on the DPI website for MAS.

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Figure 1

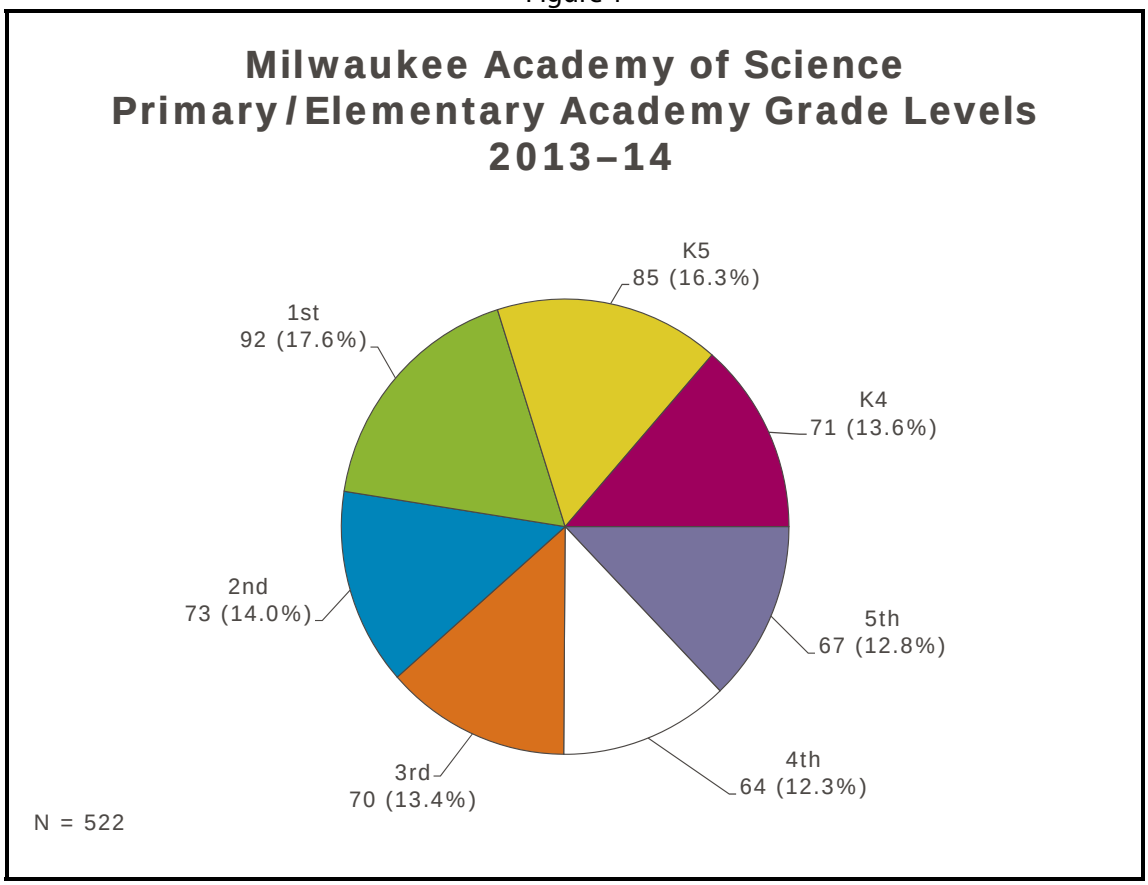
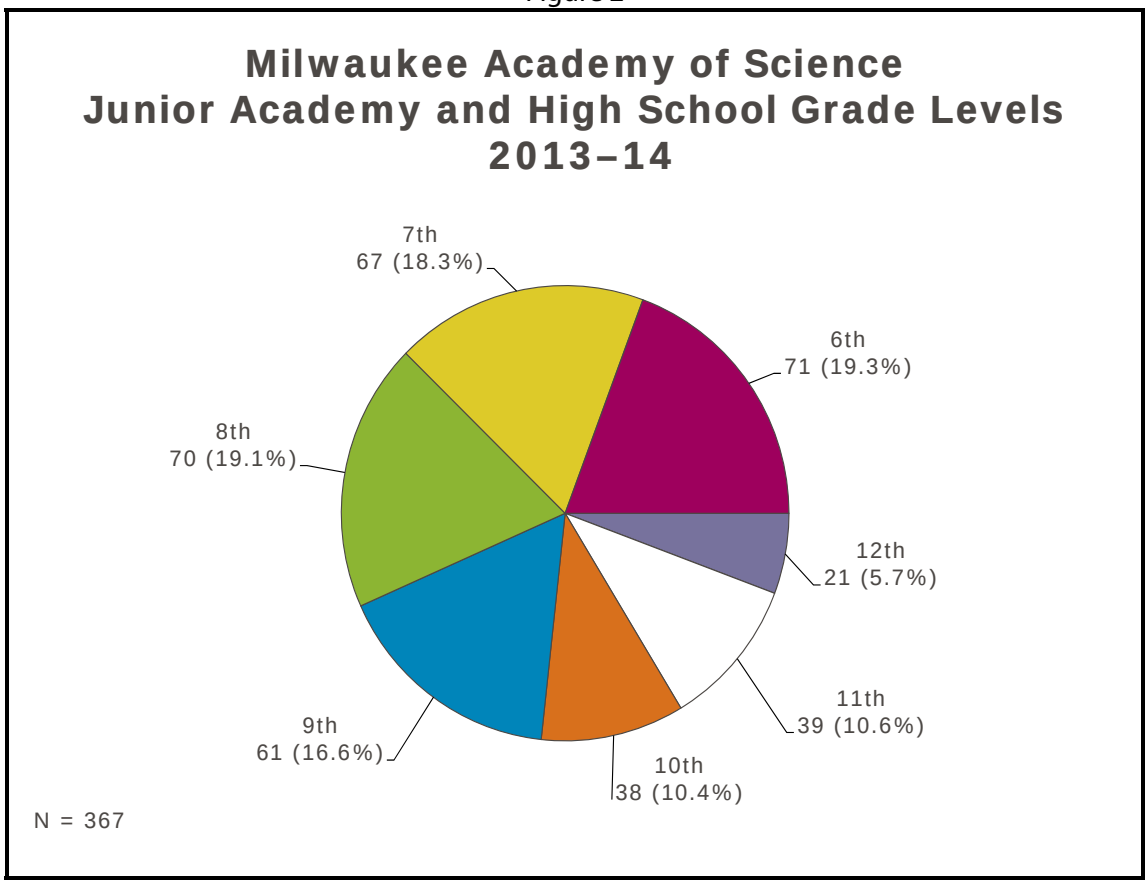


Figure 2



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There were 958 students enrolled on the third Friday of September;[32] 849 students were still enrolled on the last day of the school year. This represents an overall retention rate of 88.6%.[33] Of 533 primary/elementary academy students who were enrolled at the beginning of the year, 493 (92.5%) were still enrolled at the end; in the junior academy, 201 (87.0%) of the 231 students enrolled at the beginning stayed for the entire year; and 155 (79.9%) of 194 high school students were retained for the year.

There were 734 students enrolled at the end of the 2012–13 school year who were eligible to return to the school, i.e., they did not graduate from eighth grade or high school; 581 of those students were enrolled on the third Friday in September 2013. This represents a student return rate of 79.2%.[34]

A random sample of 24 eighth, tenth, eleventh, and twelfth graders participated in satisfaction interviews at the end of the school year. Almost all (95.8%) of the students interviewed reported that they felt safe in school, all said that they improved in reading, and most (87.5%) said they had improved in math. Of the students sampled, 100.0% reported that their teachers helped them at school and all but one (95.8%) said that they liked being in school. When asked what they liked best about the school, students most frequently mentioned that the classes are challenging and the curriculum is rigorous; the overall environment is amazing and the school feels like a family because of the closeness between staff and students; and the teachers help them learn and care about their education.

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[32] The third Friday of September is considered the beginning of the school year for student tracking purposes.

[33] Of 965 students enrolled at the beginning of the school year, 829 remained for the entire year.

[34] Of 603 K4 through seventh-grade students who were enrolled at the end of the 2012–13 school year, 475 (78.8%) were enrolled on the third Friday of September 2013. Of 131 students who were enrolled as ninth, tenth, or eleventh graders at the end of the 2012–13 school year, 106 (80.9%) returned for the 2013–14 school year.

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D. Activities for Continuous School Improvement

During the year, MAS responded to all of the activities recommended in the 2012–13 programmatic profile and educational performance report. Below is a description of each recommendation and corresponding response.

For the primary/elementary academy, the focus was on the following.

- Recommendation: Adopt and implement new strategies to improve the attendance and school engagement of the youngest students.

  Response: Staff implemented several new strategies over the course of the school year with the intent of improving students' attendance and engagement in the learning environment.

  - » Student attendance was posted daily in each classroom and was reported by teachers.
  - » Student attendance review board meetings were held with parents of students absent five or more days to design a remedial plan. These meetings were convened as soon as the threshold was recorded for a student.
  - » The state statute language was placed on student report cards.
  - » Classes with 100% attendance were recognized at all school assemblies and via an email to all school staff.

- Recommendation: Improve parental engagement and involvement in the education of their children by creating a more solid team approach to learning.

  Response: MAS adopted a rigorous homework policy.[35] Homework was assigned daily and all work was required to be 100% completed upon arrival at school the next morning. Any incomplete homework was completed by students during the school day either at lunch or recess time. Monthly newsletters were also mailed to all parents updating them on school activities and upcoming events. Several family events were held throughout the school year and many parents came for the school's science showcase.

- Recommendation: Continue strengthening the reading program by increasing the rigor of the curriculum and providing more resources for the teachers.

  Response: MAS took several steps to improve students' reading performance.

[35] Complete details about the homework policy can be found on p. 8 of the *Parent Handbook, 2013–14*.

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» Reading benchmarks were adopted and progress toward achievement was included on report cards.

» Teachers were involved in monthly professional development activities related to Great Habits Great Readers.

» Guided reading curriculum was extended into the third through fifth grades. Any student at grade level lexile was expected to work independently on higher level skills.

» Compass learning time was increased and an intensive challenge competition was held in the spring.

» Teachers engaged students in monthly writing assessments and spent subsequent time on reteaching unmastered skills to students based on their unique needs.

For the junior academy, the focus was on improving the math competencies of students through the following strategies.

- Recommendation: Implement the Common Core State Standards curriculum for both junior academy and high school students, including strengthening the content for literary instruction.

  Response: A Common Core committee was created to research and increase knowledge about the Common Core and its standards. The achievement director participated in a Common Core conference and used the materials gathered at these sessions to train a core of teachers. These teachers served as a resource for all other teachers. The committee members aligned the math curriculum to the Common Core for the sixth through twelfth grade. Special attention was also given to the literacy curriculum, including an inventory of all available materials and classification of these documents to specify their level of rigor.

- Recommendation: Use novels with greater frequency as part of the English/literature instruction.

  Response: Teachers developed units on novels and all students read at least one novel each semester. A book club was created for sixth graders to enhance their abilities to discuss novels, including themes, character development, plots, etc.

- Recommendation: Create more cohesion in the curriculum between reading and writing.

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Response: The language arts block was extended to 100 minutes. Students had the same teacher for the entire block and the expectation was that both reading and writing would be integrated in the activities undertaken during this block.

For the high school, the focus was on the following steps.

- Recommendation: Improve the rigor and relevance of the use of the quality core concepts in all courses taken by the students.

  Response: The math and English departments used the quality core concepts, which are aligned to the skills required for success on the ACT. Aligned assessments were given to students on a regular basis and the results were subsequently used by staff to adapt their instruction to increase student ability to achieve mastery on more skills. Staff also spent time aligning the curriculum to the Common Core standards and developing instructional strategies and materials to increase vigor.

- Recommendation: Create advisory groups to provide students with more supports to improve their academic outcomes and school attendance and to address personal and familial issues that challenge success in school.

  Response: Every student was assigned to an advisory group based on their grade level. There were approximately 13 students in each grouping, which met for 32 minutes once a week. The focus was on supporting students through academic advising, goal setting, community building, and social and emotional development. Advisors monitored student progress and modified goals to maximize success and positive outcomes in both academic and behavioral areas.

III. EDUCATIONAL PERFORMANCE

To monitor performance as it relates to the CSRC contract, MAS collected a variety of qualitative and quantitative information at specified intervals during prior academic years. This year, the school established goals for attendance, parent-teacher conferences, and special education student records. In addition, MAS identified local and standardized measures of academic performance to monitor student progress.

This year, local assessment measures included student progress in literacy, mathematics, and writing, as well as IEP goals for special education students. The standardized assessment measures

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used were the Phonological Awareness Literacy Screen (PALS), the Wisconsin Knowledge and Concepts Examination (WKCE),[36] the EXPLORE, the PLAN,[37] and the ACT or SAT.

A. Attendance

At the beginning of the 2013–14 academic year, the primary/elementary academy, junior academy, and high school established a goal to maintain average attendance rates of 91%. In the primary academy, a student was considered present if he/she was at the school between 8:30 a.m. and 3:20 p.m. A student was marked as attending for a partial day if he/she arrived after 11:00 a.m. or left before 3:20 p.m. Junior academy students were marked present for the day if they arrived at school prior to 10:00 a.m., and high school students were marked present only if they attended for the entire day. High schoolers who missed any portion of the day were marked truant.[38]

Primary/Elementary Academy

- Primary academy students attended school an average of 92.3% of the time. When excused absences were included, the attendance rate rose to 93.0%.
- There were 125 students suspended from school at least once during the year. These students spent, on average, 2.3 days out of school due to suspension.

Junior Academy

- Junior academy students attended school an average of 95.1% of the time. When excused absences were included, the attendance rate rose to 95.5%.

[36] The WKCE is a standardized test aligned with Wisconsin Model Early Learning Standards.

[37] The EXPLORE and PLAN were developed by ACT and measure a student's preparedness to take the ACT.

[38] Attendance data were provided for 1,000 students enrolled at any point during the school year. Attendance was calculated for each student by dividing the number of days attended by the number of days expected, then averaging all of the students' attendance rates.

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- There were 64 students suspended from school at least once during the year. These students spent, on average, 2.8 days out of school due to suspension.

High School

- High school students attended school an average of 89.7% of the time. When excused absences were included, the attendance rate rose to 91.3%.[39]
- There were 78 students suspended from school at least once during the year. These students spent, on average, 5.2 days out of school due to suspension.

The school has met its attendance goal for the primary/elementary and junior academies but not the high school. When excused absences were included, the school met their attendance goal for all three academies.

B. Parent Participation

Each academy's goal related to parent participation was that parents of at least 80% of students enrolled for the entire school year would attend two of three scheduled parent-teacher conferences. Conferences were scheduled for November 2013, February 2014, and April 2014.

- Of the 493 primary/elementary academy students enrolled all year, parents of 440 (89.2%) attended two of three conferences.
- Of the 201 junior academy students enrolled for the entire year, parents of 198 (98.5%) attended two of three conferences.
- Of the 155 high school students enrolled all year, parents of 127 (81.9%) attended two of three conferences.

All three academies, therefore, met their goal related to parent participation.

[39] High school excused absences were provided by period. To calculate the number of days excused, CRC summed the number of periods and divided by seven.

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C. Special Education Student Records

The school established a goal to maintain up-to-date records for all special education needs students. An IEP was developed and/or reviewed for all 61 primary/elementary academy, all 25 junior academy, and all 18 high school special education students enrolled at the end of the year who qualified for and were not dismissed from special education services.

In addition, CRC conducted a random review of special education files. This review indicated that IEPs were routinely completed and that parents were invited to develop and/or be involved in developing the IEP. The school therefore met its goal to maintain records on all students with special needs.

D. Local Measures of Educational Performance

Charter schools, by their definition and nature, are autonomous schools with curricula that reflect each school's individual philosophy, mission, and goals. In addition to administering standardized tests, each charter school is responsible for describing the goals and expectations for its students in the context of that school's unique approach to education. These goals and expectations are established by each City of Milwaukee charter school at the beginning of the academic year to measure the educational performance of their students. These local measures are useful for monitoring and reporting progress, guiding and improving instruction, clearly expressing the expected quality of student work, and providing evidence that students are meeting local benchmarks.

At the beginning of the school year, MAS designated three different areas in which students' competencies would be measured: literacy, mathematics, and writing. The school also set a goal related to special education IEP goal progress.

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1. Primary/Elementary Academy

a. Literacy

i. PALS for K4 and K5 Students

The PALS assessment and benchmarks are described in detail in the External Standardized Measures of Educational Performance section of this report. In addition to administering the assessment as required by DPI and CSRC, MAS also elected to use the PALS-PreK and PALS-K as their local measure for students in grades K4 and K5. The school's goal was that at least 85% of students who completed both the fall and spring assessments would achieve the summed score benchmark on the spring assessment. As described below, the PALS-PreK does not include a summed score benchmark but does include developmental ranges for each of the required tasks. For K4 students, CRC examined how many students were at or above the developmental range for five or more of the seven tasks. The measure for K5 students remained the percent at the summed score benchmark in the spring.

A total of 64 K4 students completed the fall and spring PALS-PreK. Three quarters (75.0%) of those students were at or above the developmental range for all seven tasks at the time of the spring assessment, 10 (15.6%) were at or above the range for six of seven tasks, and three (4.7%) were at or above the developmental range for five of seven tasks (Table 1). Overall, 95.3% of students were at or above the range for at least five of seven tasks; this exceeds the school's goal of 85.0%.

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Table 1 Milwaukee Academy of Science PALS-PreK for K4 Students Number of Tasks Students at or Above Range 2013–14 (N = 64)		
Number of Tasks	**N**	**%**
Seven	48	75.0%
Six	10	15.6%
Five	3	4.7%
Four	0	0.0%
Three	0	0.0%
Two	1	1.6%
One	0	0.0%
Zero	2	3.1%

A total of 71 K5 students completed the fall and spring PALS-K. Most (67, or 94.4%) of those students were at or above the spring summed score benchmark, exceeding the school's goal of 85%.

ii. MAP Reading Test for First Through Fifth Graders

First- through fifth-grade literacy skills were assessed using the MAP reading test. MAP tests are computerized, adaptive tests that measure student skills and provide educators with information necessary to build curriculum to meet their students' needs. Every item on the MAP tests corresponds to a value on the Rasch unit (RIT) scale.[40] A level of difficulty is assigned to each item and each value represents an equal interval measurement, meaning the difference between scores is the same regardless of where the student scores on the scale. The RIT scale shows student understanding,

[40] The RIT score indicates student skills on developmental curriculum scales or continua. There are RIT scales for each subject, so scores from one subject are not the same as for another. Individual growth targets are defined as the average amount of RIT growth observed for students in the latest Northwest Evaluation Association (NWEA) norming study who started the year with an RIT score in the same 10-point RIT block as the individual student. For more information on the RIT score and the mean growth target score, see the NWEA website: https://www.nwea.org/content/uploads/2014/07/MAP-Normative-Data-One-Sheet-Dec11.pdf.

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regardless of grade level, which allows easy comparison from year to year. Educators can use the RIT reference chart to determine the students' level of understanding in three subject areas (reading, math, and language usage).[41]

MAP scores can be used to measure progress in a number of ways.

a. Based on the student's grade level and his/her fall RIT score, he/she receives a spring target score. At the time of the third test, progress can be measured by whether the student met his/her target score.

b. Teachers, parents, and students may measure growth based on the change in RIT scores from the first test to the last test during the school year. Because the tests are scored so that an increase in one point is the same regardless of where the student falls on the scale, progress may be determined by measuring how many RIT points the student gained or lost from one test to the other.

c. In 2011, NWEA conducted a nationwide study of student performance. As a result of that study, a normative mean, or average, is assigned to each grade level at the time of the fall, winter, and spring tests. Student progress can be measured by comparing each student's performance to these nationally normed scores for his/her grade level.

MAS elected to use a combination of these methods for their local measure this year. The school set goals for students who were above the normative mean for their grade level at the time of the fall test and for students who were at or below the normative mean for their grade level in the fall. First and second graders above the normative mean were expected to gain at least six RIT points from fall to spring; third through fifth graders above the normative mean in the fall were expected to increase their RIT scores by at least four points by the time of the spring test.

For students at or below the normative mean for their grade level, progress was determined by examining whether the student met the MAP growth target based on his/her fall test score and current grade level; students who met their growth target for the year will have made adequate progress for the year. The school's overall goal was that at least 70% of students in first through fifth grade who took both the fall and spring MAP assessments would make progress as described above.

[41] NWEA, retrieved from http://www.nwea.org/products-services/computer-based-adaptive-assessments/map

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In 2013–14, MAP rolled out the Common Core MAP assessment. Schools using the MAP assessments were given the opportunity to choose between the regular MAP assessment and the Common Core MAP assessment; MAS elected to switch to the Common Core version this year. Although the school used an alternative version of the assessment, the normative means from the 2011 study still apply.[42]

A total of 334 first through fifth graders completed the fall and spring MAP reading test. At the time of the fall test, 87 (26.0%) students were above the normative mean for their grade level while 247 (74.0%) students were at or below mean. Of the 87 students who were above the normative mean for their grade level in the fall, 70 (80.5%) met the goal as described above and 169 (68.4%) of the 247 students at or below the normative mean for their grade level in the fall met the MAP growth target at the time of the spring test (Table 2). Overall, 71.6% of students progressed from fall to spring, meeting the primary/elementary academy's MAP reading goal.

[42] NWEA, retrieved from http://www.nwea.org/sites/www.nwea.org/files/resources/Common%20Core-Aligned%20MAP%20and%20MPG%20FAQ%204.22.13%5B2%5D.pdf

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Table 2 Milwaukee Academy of Science Local Measures of Academic Progress: MAP Reading Assessment Progress for 1st Through 5th Graders Fall 2013 to Spring 2014			
Grade Level	**Total N**	**Met Goal**	
		N	**%**
Students Above the Normative Mean in Fall 2013			
1st	18	17	94.4%
2nd	28	26	92.9%
3rd	16	13	81.3%
4th	16	9	56.3%
5th	9	Cannot report due to *n* size	
Total	**87**	**70**	**80.5%**
Students at or Below the Normative Mean in Fall 2013			
1st	62	42	67.7%
2nd	40	26	65.0%
3rd	48	30	62.5%
4th	44	27	61.4%
5th	53	44	83.0%
Total	**247**	**169**	**68.4%**

b. Mathematics

i. Math Skills Assessment

To assess primary/elementary academy student progress in mathematics, the school set a goal that at least 80% of K4 and K5 students who completed the fall and spring math skill assessments would acquire at least 80% of the math competencies designated as benchmarks for their grade level at the time of the spring assessment. MAS staff designed the math skills assessments based on their SRA Real Math curriculum; the skills assessments are aligned to the common core standards for K4 and K5 students.

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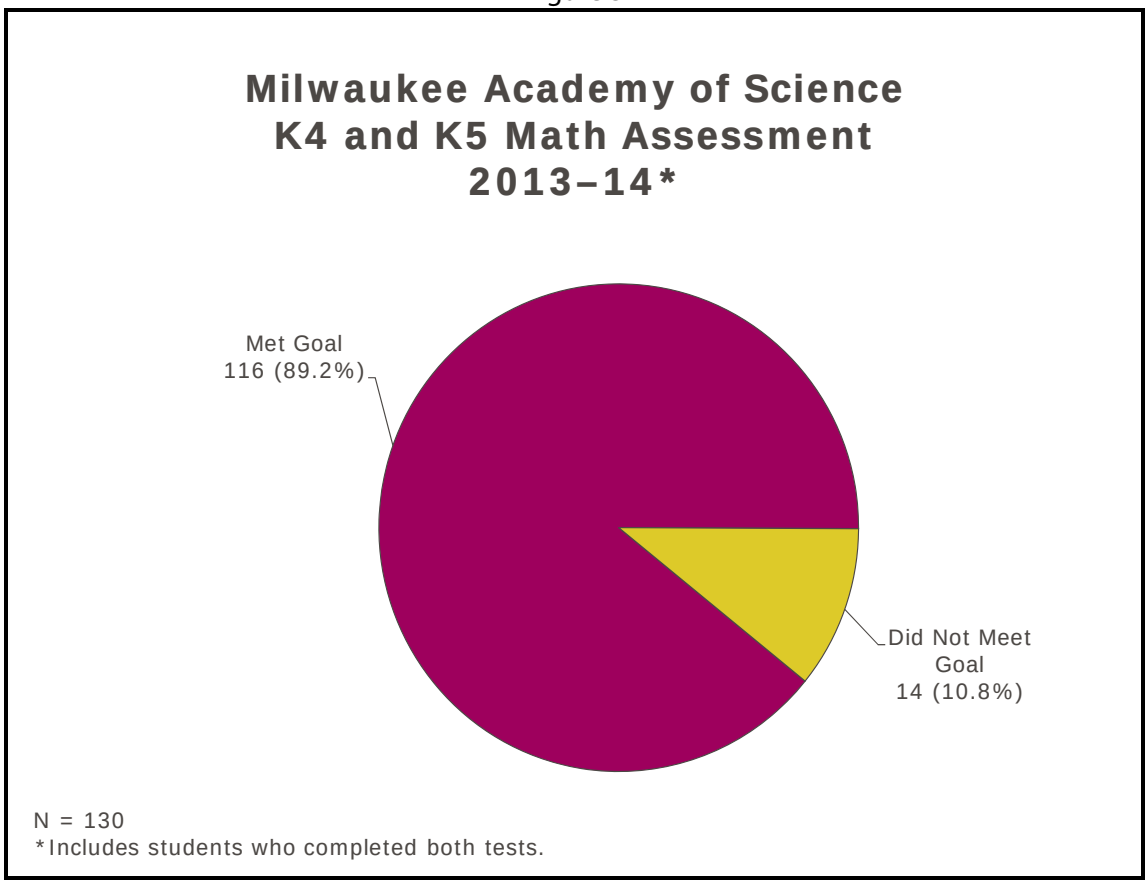
At the time of the spring assessment, 89.2% of 130 K4 and K5 students who completed the fall and spring assessments had met the math goal, exceeding the school's goal (Figure 3).

Figure 3



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ii. MAP Math Test for First Through Fifth Graders

MAP assessments and the varying methods available for tracking student progress using MAP results are described in the reading section above. As with reading, the school set math progress goals for first- through fifth-grade students who were above the normative mean for their grade level at the time of the fall test and for students who were at or below the normative mean for their grade level in the fall. First and second graders above the normative mean were expected to gain at least six RIT points from fall to spring; third through fifth graders above the normative mean in the fall were expected to increase their RIT scores by at least four points by the time of the spring test.

For students at or below the normative mean for their grade level, progress was determined by examining whether the student met the MAP growth target based on his/her fall test score and current grade level; students who met their growth target for the year were considered to have made adequate progress for the year. The school's overall goal was that at least 70% of students in first through fifth grade who took both the fall and spring MAP assessments would make progress as described above.

A total of 334 first through fifth graders completed the fall and spring MAP math tests. At the time of the fall test, 105 (31.4%) students were above the normative mean for their grade level while 229 (68.6%) students were at or below. Of the 105 students who were above the normative mean for their grade level in the fall, 102 (97.1%) met the goal as described above and 154 (67.2%) of the 229 students at or below the normative mean for their grade level in the fall met the MAP growth target at the time of the spring test (Table 3). Overall, 76.6% of students progressed from fall to spring, exceeding the primary/elementary academy's MAP math goal.

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Table 3 Milwaukee Academy of Science Local Measures of Academic Progress: MAP Math Assessment Progress for 1st Through 5th Graders Fall 2013 to Spring 2014			
Grade Level	**Total N**	**Met Goal**	
		N	**%**
Students Above the Normative Mean in Fall 2013			
1st	27	26	96.3%
2nd	36	36	100.0%
3rd	15	14	93.3%
4th	17	16	94.1%
5th	10	10	100.0%
Total	**105**	**102**	**97.1%**
Students at or Below the Normative Mean in Fall 2013			
1st	55	35	63.6%
2nd	32	23	71.9%
3rd	48	34	70.8%
4th	43	26	60.5%
5th	51	36	70.6%
Total	**229**	**154**	**67.2%**

c. Writing

To assess student skills in writing, teachers judged student writing samples at the end of the school year and assigned a score to each student in each of six domains: purpose and focus, organization and coherence, development of content, sentence fluency, word choice, and grammar. Students received a score of 1 for minimal/basic control, 2 for adequate control, or 3 for proficient/advanced control for each domain, and these were totaled for an overall score. An overall score of 12 or more indicated the student was writing at grade level. The school's goal was for 75% of students in third through fifth grades to achieve an overall average score of 12 or more.

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Students scored, on average, 12.4 points. However, only 135 (73.5%) of 189 third- through fifth-grade students assessed in writing reached a score of 12 or more, just short of the school's goal (Table 4).

Table 4

Milwaukee Academy of Science
Writing Skills for 3rd Through 5th Graders Based on Teacher Assessment
2013–14

Grade	N	Writing Score Average	% Met Goal*
3rd	63	11.5	57.1%
4th	62	12.6	83.9%
5th	64	13.1	79.7%
Total	**189**	**12.4**	**73.5%**

*Received a score of 12 or higher.

d. IEP Goals for Special Education Students

This year, the primary/elementary academy's goal was that at least 80% of special education students would meet one or more goals defined on their IEPs as assessed by the participants in their most recent annual IEP reviews. There were 61 special education students enrolled at the end of the year; IEPs for 12 of those students were initial and were not due for an assessment of student progress toward meeting goals during the 2013–14 school year. All 49 students requiring an IEP review had one; 42 (85.7%) of those students met at least one of their IEP goals, exceeding the school's goal.

2. Junior Academy

a. MAP Reading Assessment for Sixth, Seventh, and Eighth Graders

As described earlier in this report, MAP scores can be used several ways to measure student reading progress. The junior academy elected to use a combination of the different methods to measure progress for students in sixth through eighth grades. Specifically, students who were above

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the normative mean for their grade level at the time of the fall test were expected to increase at least one RIT point at the time of the spring test. Students who were at or below the normative mean for their grade in the fall were expected meet the MAP growth target based on their fall RIT score and current grade level. The school's overall goal was that at least 70% of junior academy students would show progress as described above.

A total of 203 sixth through eighth graders completed the fall and spring MAP reading test. At the time of the fall test, 57 (28.1%) students were above the normative mean for their grade level while 146 (71.9%) students were at or below mean. Of the 57 students who were above the normative mean for their grade level in the fall, 49 (86.0%) met the goal as described above and 111 (76.0%) of the 146 students at or below the normative mean for their grade level in the fall met the MAP growth target at the time of the spring test (Table 5). Overall, 78.8% of students progressed from fall to spring, exceeding the junior academy's MAP reading goal.

Table 5

Milwaukee Academy of Science
Local Measures of Academic Progress: MAP Reading Assessment
Progress for 6th Through 8th Graders
Fall 2013 to Spring 2014

Grade Level	Total N	Met Goal	
		N	%
Students Above the Normative Mean in Fall 2013			
6th	14	13	92.9%
7th	15	15	100.0%
8th	28	21	75.0%
Total	**57**	**49**	**86.0%**
Students at or Below the Normative Mean in Fall 2013			
6th	57	39	68.4%
7th	49	42	85.7%
8th	40	30	75.0%
Total	**146**	**111**	**76.0%**

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b. MAP Math Assessment for Sixth, Seventh, and Eighth Graders

The junior academy set a local math goal similar to the reading goal described in the previous section. Specifically, students who were above the normative mean for their grade level at the time of the fall test were expected to increase at least one RIT point at the time of the spring test. Students who were at or below the normative mean for their grade in the fall were expected to meet the MAP growth target based on their fall RIT score and current grade level. The school's overall goal was that at least 70% of junior academy students would show progress as described above.

A total of 203 sixth- through eighth-grade students completed the fall and spring MAP math tests. At the time of the fall test, 56 (27.6%) students were above the normative mean for their grade level while 147 (72.4%) students were at or below mean. Of the 56 students who were above the normative mean for their grade level in the fall, 47 (83.9%) met the goal as described above and 108 (73.5%) of the 147 students at or below the normative mean for their grade level in the fall met the MAP growth target at the time of the spring test (Table 6). Overall, 76.4% of students progressed from fall to spring, exceeding the junior academy's MAP math goal.

Table 6

Milwaukee Academy of Science
Local Measures of Academic Progress: MAP Math Assessment
Progress for 6th Through 8th Graders
Fall 2013 to Spring 2014

Grade Level	Total N	Met Goal	
		N	%
Students Above the Normative Mean in Fall 2013			
6th	19	18	94.7%
7th	11	9	81.8%
8th	26	20	76.9%
Total	**56**	**47**	**83.9%**
Students at or Below the Normative Mean in Fall 2013			
6th	52	35	67.3%
7th	53	41	77.4%
8th	42	32	76.2%
Total	**147**	**108**	**73.5%**

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c. Writing

At the end of the school year, teachers judged student writing samples in six domains: purpose and focus, organization and coherence, development of content, sentence fluency, word choice, and grammar and assign 0 to 5 points in each of the six and combine them for an overall writing score. For junior academy students, an overall score of 18 or more indicated that the student was writing at grade level. The goal was that students in sixth through eighth grades would, on average, achieve a score of 18 or more. Students scored, on average, 20.1 points, exceeding the junior academy's writing goal (Table 7).[43]

Table 7

Milwaukee Academy of Science
Junior Academy Writing Skills Based on Teacher Assessment
2013–14

Grade	N	Writing Score Average
6th	73	20.5
7th	67	19.7
8th	70	20.1
Total	**210**	**20.1**

[43] Of 210 junior academy students, 151 (71.9%) scored 18 or more points.

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d. Special Education Students

This year, the goal for the junior academy was that 80% of special education students would meet one or more goals on their IEP, as assessed by the participants in their most recent annual IEP review. At the end of the year, 25 special education students in sixth through eighth grades had completed IEPs. A total of 23 (92.0%) of those students met one or more of the goals in their IEP, exceeding the junior academy's special education goal.

3. High School

a. Literacy

i. EXPLORE and PLAN Reading and English Tests for Ninth and Tenth Graders

Ninth-grade students take the EXPLORE, the first in a series of ACT pre-tests, in the fall and spring of the school year; tenth-grade students take the PLAN, the second test in the series. The EXPLORE and PLAN are described in detail in the standardized test section of this report. The school's internal goal related to the tests was that at least 70% of ninth and tenth graders who took both the fall and spring assessments would reach the benchmark at the time of the spring test or improve at least one point from fall to spring. Over 60% of ninth graders progressed on the reading or English subtests; when combined, 80.6% of students showed literacy progress. Almost 90% of tenth-grade students met the English goal but only 64.7% met the reading goal. When English and reading results were combined, 80.6% of ninth graders and 100.0% of tenth graders met the English/reading goal, exceeding the school's local literacy goal for ninth and tenth graders (Table 8).

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Table 8 Milwaukee Academy of Science 9th and 10th Grades Literacy Progress Based on EXPLORE and PLAN English and Reading Tests 2013–14							
Grade/Test	**N**	**Students Who Achieved Benchmark Spring 2014**		**Students Who Did Not Achieve Benchmark But Increased at Least One Point From Fall to Spring**		**Goal Met?***	
		N	**%**	**N**	**%**	**N**	**%**
9th-Grade EXPLORE							
English	62	24	38.7%	14	22.6%	**38**	**61.3%**
Reading	62	13	21.0%	26	41.9%	**39**	**62.9%**
Overall	**62**	**--**	**--**	**--**	**--**	**50**	**80.6%**
10th-Grade PLAN							
English	34	26	76.5%	4	11.8%	**30**	**88.2%**
Reading	34	13	38.2%	9	26.5%	**22**	**64.7%**
Overall	**34**	--	--	--	--	**34**	**100.0%**

*Reached benchmark by spring or improved at least one point from fall to spring; for overall, student met benchmark or improved for the English and/or reading test.

ii. Scholastic Reading Inventory for Eleventh and Twelfth Graders

The school set a goal that eleventh and twelfth graders be administered the SRI in the fall and again in the spring. The goal was to show improvement in scores, called measures, of at least 13 points. Lexile measures can range from 0 (beginning reader) to 1,700 and are used to help students find books that align with reading skills.[44] Lexile levels cannot be converted into grade-level units. Based on SRI scores from the spring of 2014 test administration, students scored, on average, within the typical reader measures for their grade levels (Table 9).[45]

[44] The Lexile Framework for Reading, retrieved from www.lexile.com/about-lexile/lexile-overview; https://lexile-website-media-2011091601.s3.amazonaws.com/cms_page_media/135/What%20does%20the%20Lexile%20Measure%20Mean.pdf

[45] The Lexile Framework for Reading, retrieved from www.lexile.com/about-lexile/grade-equivalent/grade-equivalent-chart/

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Table 9 Milwaukee Academy of Science 11th and 12th Grades Scholastic Reading Inventory Lexile Measures at the End of the Year Spring 2014					
Grade	**N**	**Minimum**	**Maximum**	**Average**	**Typical Reader Measures**
11th	39	164L	1,452L	1,071.6L	940L to 1,210L
12th	21	533L	1,316L	980.6L	940L to 1,210L

Nearly three quarters (71.8%) of eleventh graders and over half (52.4%) of twelfth graders with comparable SRI measures showed improvement (as measured by a 13-point increase) in reading skills (Table 10). On average, students improved 56.3 points, exceeding the high school's reading goal for eleventh and twelfth graders.

Table 10 Milwaukee Academy of Science 11th and 12th Grades Literacy Progress Based on SRI Measures 2013–14				
Grade	**N**	**Number Improved***	**Percentage Improved**	**Average Increase in Score**
11th	39	28	71.8%	72.9L
12th	21	11	52.4%	25.4L
Total	**60**	**39**	**65.0%**	**56.3L**

*Improved by 13 or more points.

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b. Mathematics

i. EXPLORE and PLAN Math Test for Ninth and Tenth Graders

Ninth-grade students completed the EXPLORE math test, and tenth-grade students completed the PLAN math test in the fall and spring of the school year. The school's goal was that at least 55.0% of ninth and tenth graders who took both the fall and spring assessments would reach the benchmark at the time of the spring test or improve at least one point from the fall to spring. Of 62 ninth graders who completed both EXPLORE assessments, 35 (56.5%) reached the math benchmark by the spring test or improved one point from fall to spring; 19 (55.9%) of 34 tenth graders who completed both PLAN assessments met the math goal (Table 11). Overall, 56.3% of ninth and tenth graders showed improvement in math, meeting the school's internal math goal.

Table 11

Milwaukee Academy of Science
9th and 10th Graders
Math Progress Based on the EXPLORE and PLAN Math Test
2013–14

Grade	N	Students Who Achieved Benchmark Spring 2014		Students Who Did Not Achieve Benchmark But Increased at Least One Point From Fall to Spring		Goal Met?*	
		N	%	N	%	N	%
9th	62	15	24.2%	20	32.3%	**35**	**56.5%**
10th	34	9	26.5%	10	29.4%	**19**	**55.9%**

*Reached benchmark by spring or improved at least one point from fall to spring.

ii. End-of-Year Math Assessment for Eleventh and Twelfth Graders

To assess math progress for eleventh and twelfth graders, the school set a goal that at least 65% of students in each math class would attain a score of 70% or more on their comprehensive

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course examinations at the end of the school year.[46] Scores were reported as percentage correct. Results from exams at the end of the year indicate that, on average, students scored 66.1% correct. Of the 57 students with scores available, 52.6% scored 70.0% or higher, falling short of the school's goal of 65.0% (Table 12).[47]

Table 12

Milwaukee Academy of Science
High School –11th and 12th Grades
Final Math Exam Percentage Correct at the End of the Year
Spring 2014

Grade	N	Minimum %	Maximum %	Average %	Met Goal*
11th	38	10.0%	95.0%	68.8%	68.4%
12th	19	39.0%	85.0%	60.6%	21.1%
Total	**57**	**--**	**--**	**66.1%**	**52.6%**

*Scored 70% or better on the end-of-year math assessment.

c. Writing

At the end of the school year, teachers judged student writing samples and assigned a score to each student. Student writing skills were assessed in six domains: purpose and focus, organization and coherence, development of content, sentence fluency, word choice, and grammar. Each domain was assigned a score from 0 to 5. Scores in each domain were totaled. A score of 18 or higher indicated that the student was writing at grade level. The goal was that students in ninth through twelfth grades would reach a score of 18 or more, on average.

Students scored, on average, 18.8 points, meeting the high school writing goal (Table 13).[48]

[46] The school also set a goal that all new eleventh and twelfth graders would take the Wide Range Achievement Test for math within 30 days of enrollment; the school met this goal.

[47] Of 57 students, 30 (52.6%) students received a score of 70% or higher.

[48] Of 160 high school students, 101 (63.1%) scored 18 or more points.

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Table 13 Milwaukee Academy of Science High School Writing Skills Based on Teacher Assessment 2013–14		
Grade	**N**	**Writing Score Average**
9th	62	18.7
10th	38	20.5
11th	39	17.7
12th	21	18.4
Total	**160**	**18.8**

d. Special Education Students

This year, the goal for the high school was that 80.0% of special education students would meet one or more goals on their IEP, as assessed by the participants in their most recent annual IEP review. At the end of the year, 18 special education students in ninth through twelfth grades had completed IEPs. IEPs for two student were initial, and progress toward meeting goals was not required. Annual IEPs were available for the remaining 16 students; 14 (87.5%) of those students met one or more of the goals in their IEP, exceeding the high school's special education goal.

E. Additional Requirements for High School Students

In addition to local and externalized measures, the high school must also measure completion of student graduation plans and track progress toward graduation.

1. Graduation Plans

All 159 high school students enrolled at the end of the year developed a graduation plan. All of the completed graduation plans included the students' postsecondary plans, included a schedule reflecting the credits required to graduate, and were reviewed by the counselor. All but two were

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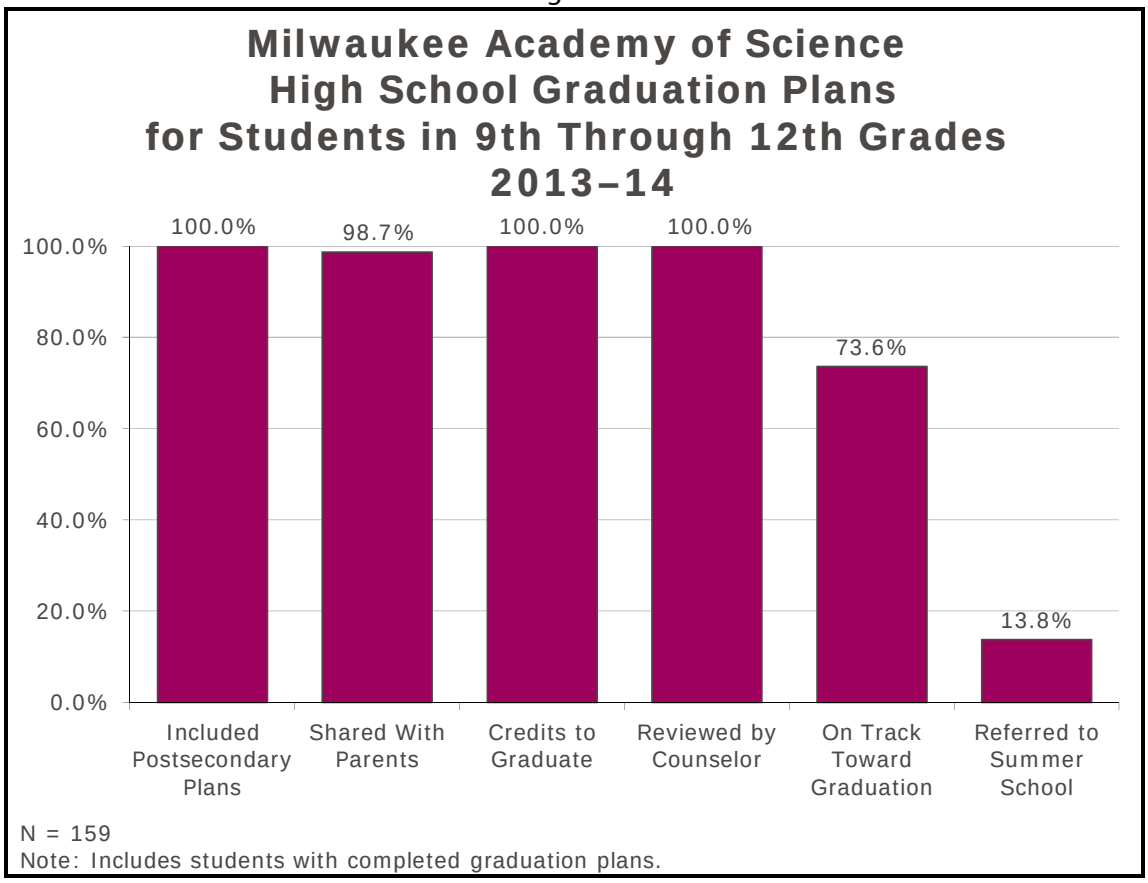
submitted to parents for their review. Counselors reviewed the plans in part to ensure that students were on track to graduate and to determine whether a student should be referred for summer school. Based on those reviews, 73.6% of students were on track to graduate in four years, and 13.8% were referred to summer school (Figure 4). Additionally, each eleventh- and twelfth-grade student was required to meet with the counselor during the first quarter to discuss his/her graduation plan; all 60 students met with the counselor during the school year (not shown).

Figure 4



2. <u>High School Graduation Requirements</u>

MAS's graduation requirement policy states that all ninth graders who earned at least 6.0 credits would be promoted to tenth grade; all tenth graders who accumulated at least 11 credits

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would be promoted to eleventh grade; all eleventh graders who accumulated at least 16.5 credits would be promoted to twelfth grade; and all twelfth graders who earned 22 or more credits would graduate.[49, 50]

MAS provided credit and promotion information for high school students who finished the school year at MAS. Of 159 students, 127 (79.9%) earned at least the minimum number of credits to be promoted to the next grade or, in the case of twelfth graders, to graduate from high school. (Table 14).

Table 14

Milwaukee Academy of Science
High School Graduation Requirements
2013–14

Grade	N	Average Credits Earned/Accumulated	Promoted/Graduated	
			N	%
9th	61	5.9	38	62.3%
10th	38	12.9	32	84.2%
11th	39	19.8	37	94.9%
12th	21	26.6	20	95.2%
Total	**159**	**--**	**127**	**79.9%**

[49] In 2013–14, MAS adopted new graduation requirements for the class of 2017 (i.e., students who are ninth graders this year). The new requirements are six credits to move from ninth to tenth grade, 12 to move from tenth to eleventh grade, 18 to move from eleventh to twelfth grade, and 24 to graduate.

[50] This grade-level promotion schedule reflects the credits needed at each grade level in order to graduate in four years. IEPs for some special education students indicate that the student will need more than four years of study to graduate; these students are promoted based on the following credit requirements: 4.5 credits to move from ninth to tenth grade; nine to move from tenth to eleventh grade; 13.5 to move from eleventh to twelfth grade; and 22 to graduate.

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F. External Standardized Measures of Educational Performance

In 2013–14, DPI required that all schools administer PALS assessments to students in K4 through first grade and the WKCE to third through eighth and tenth graders.[53] These tests and results are described in the following sections.

1. Primary/Elementary Academy

a. PALS

In 2013–14, DPI required that all students in grades K4 through first grade take the PALS assessment in the fall and spring of the school year. In addition, CSRC required that all second graders take the PALS in the spring semester. PALS aligns with both the Common Core in English and the Wisconsin Model Early Learning Standards (WMELS).

There are three versions of the PALS assessment: the PALS-PreK for K4 students, the PALS-K for K5 students, and the PALS 1–3 for first through third graders. The PALS-PreK is comprised of five required tasks (name writing, uppercase alphabet recognition, beginning sound awareness, print and word awareness, and rhyme awareness). There are two additional tasks (lowercase alphabet recognition and letter sounds) that students complete only if they reach a high enough score on the uppercase alphabet task. Finally, there is one optional task (nursery rhyme awareness) that schools can choose to administer or not. Because this later task is optional, CRC does not report data on nursery rhyme awareness.

The PALS-K is comprised of six required tasks (rhyme awareness, beginning sound awareness, alphabet knowledge, letter sounds, spelling, and concept of word) and one optional task (word

[53] Per the CSRC contract, the school will administer all tests required by DPI within the timeframe specified by DPI; this includes the PALS. The timeframe for the fall PALS assessment was October 14 to November 8, 2013, for K4 and K5 students and September 16 to October 25, 2013, for first graders. The spring testing window was April 28 to May 23, 2014, for all grade levels. In anticipation of a DPI requirement to test second-grade students using the PALS in the fall and spring of 2014–15, CSRC required that all second-grade students in Milwaukee charter schools complete the PALS in the spring of 2014. The timeframe for the WKCE was October 28 to November 29, 2013.

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recognition in isolation). The PALS 1–3 is comprised of three required tasks (spelling, word recognition in isolation, and oral reading in context). The PALS 1–3 also includes one additional required task for first graders during the fall administration (letter sounds) as well as additional tasks for students who score below the summed score benchmark. These additional tasks are used to gather further diagnostic information about those students.

For the PALS-K and PALS 1–3, specific task scores are summed for an overall summed score. For the PALS 1–3, the fall and spring summed scores are calculated using different task combinations. The summed score is then compared to benchmarks set for each grade level and test administration. Reaching or surpassing the benchmark is not an indicator that the student is reading at grade level; the benchmark simply helps teachers identify which students may have difficulty learning to read. For example, if a student's summed score is below the designated benchmark for his/her grade level and test administration, the student is identified as requiring additional instruction to master basic literacy skills.[54] Students who are at or above the benchmark have the basic skills required to, with targeted instruction, continue learning to read without intervention. Teachers may use results of the PALS assessments to help plan classroom reading and spelling instruction according to student needs.

There is no similar summed score or set benchmarks for the PALS-PreK. Because students enter K4 with different levels of exposure to books, letters, and sounds, the purpose of the PALS-PreK is to learn where students are at as they enter K4 in the fall. In the spring, developmental ranges for each PALS task indicate whether the student is at the expected developmental stage for a 4-year-old child.

[54] PALS, retrieved from http://www.palswisconsin.info/about_overview.shtml

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i. PALS-PreK

A total of 70 K4 students completed the PALS-PreK in the fall and 68 students completed the spring assessment; 64 students completed both. Although the spring developmental ranges relate to expected age-level development by the time of the spring semester, CRC applied the ranges to both test administrations to see if more students were at or above the range for each test by the spring administration. The number of students at or above the developmental range increased for each task from fall to spring (Table 15). By the time of the spring assessment, 61 (95.3%) of 64 students who completed both were at or above the developmental range for five or more tasks; 58 (90.6%) were at or above the range for six of seven tasks, and 48 (75.0%) were at or above the range for all seven tasks (not shown).

Table 15

Milwaukee Academy of Science
PALS-PreK for K4 Students
Students at or Above the Spring Developmental Range
2013–14
(N = 64)

Task	Fall		Spring	
	N	%	N	%
Name writing	48	75.0%	60	93.8%
Uppercase alphabet recognition	36	56.3%	61	95.3%
Lowercase alphabet recognition	29*	100.0%	61	95.3%
Letter sounds	25*	86.2%	61	95.3%
Beginning sound awareness	35	54.7%	61	95.3%
Print and word awareness	28	43.8%	56	87.5%
Rhyme awareness	29	45.3%	53	82.8%

*Out of 29 students who qualified to complete the lowercase and letter sound tasks in the fall.

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ii. PALS-K and PALS 1–3

As mentioned above, each of these tests has a summed score benchmark for the fall and spring (Table 16). As noted above, the fall and spring summed score benchmarks are calculated using different task combinations. Therefore, the spring benchmark may be lower than the fall benchmark. Additionally, student benchmark status is only a measure of whether the student is where he/she should be developmentally to continue becoming a successful reader; measures of student progress from fall to spring should be interpreted with caution.

Table 16

PALS-K and PALS 1–3 Summed Score Benchmarks

PALS Assessment	Fall Benchmark	Spring Benchmark
PALS-K	28	81
PALS: 1st Grade	39	35
PALS: 2nd Grade	35[55]	54

There were 71 K5 and 81 first-grade students who completed the fall and spring PALS assessments. CRC examined progress from fall to spring for students who completed both tests. By the time of the spring assessment, 94.4% of K5 students and 71.6% of first graders were at or above the spring summed score benchmark for their grade level. Nearly all (97.1%) K5 students and about three quarters of first-grade students who were at or above the fall benchmark were also at or above the spring benchmark (Table 17). Additionally, 49 (68.1%) second graders were at or above the spring summed score benchmark (not shown).

[55] The PALS assessment was not administered to second-grade students in the fall of 2013; next year, it will be administered in the fall and spring. Third graders were not required to take the PALS.

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Table 17 Milwaukee Academy of Science Reading Readiness for K5 and 1st Graders Fall 2013 to Spring 2014					
Grade-Level and Fall Benchmark Status	**N**	**Spring Benchmark Status**			
		Below Benchmark		**At or Above Benchmark**	
		N	**%**	**N**	**%**
K5					
Below Benchmark	**3**	Cannot report due to *n* size			
At or Above Benchmark	**68**	2	2.9%	66	97.1%
Total K5	**71**	**4**	**5.6%**	**67**	**94.4%**
1st Grade					
Below Benchmark	**11**	5	45.5%	6	54.5%
At or Above Benchmark	**70**	18	25.7%	52	74.3%
Total First	**81**	**23**	**28.4%**	**58**	**71.6%**

b. WKCE for Third Through Fifth Graders

The WKCE was designed to align with WMELS in reading and math. Up through the 2011–12 school year, proficiency-level cut scores reflected levels set by the state to describe how students perform relative to those standards. These proficiency-level cut scores, used up until the 2012–13 school year, are referred to as former cut scores throughout the report. Skills are assessed as minimal, basic, proficient, or advanced.

In 2012–13, in order to more closely align with national and international standards, the WKCE reading and math proficiency-level cut scores were revised to mimic cut scores used by the National Assessment of Educational Progress (NAEP). The revised cut scores require that students achieve higher scale scores in reading and math in order to be considered proficient. Because many of the CSRC standards were set based on years of WKCE data prior to implementation of the revised cut scores, CRC reports current year and year-to-year WKCE reading and math results using both

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standards. This allows schools and stakeholders to see how students and the school performed when different standards were applied.

DPI requires all students in third through eighth and in tenth grades to participate in WKCE testing in October or November to meet federal No Child Left Behind requirements. CSRC requires that schools administer standardized tests to all third- through fifth-grade students to provide an assessment of student skills and provide a basis for student progress over consecutive school years. Results for primary/elementary academy students who took the examinations are included in this section. This section reflects results for all students enrolled in the school who were administered all portions of the exams, including those enrolled for a full academic year (FAY) or longer and those students who were new to the school.

In October 2013, 70 third graders, 64 fourth graders, and 66 fifth graders completed the WKCE. Using the revised cut scores, two (2.9%) third graders scored at the proficient level and one (1.4%) scored at the advanced level in reading, three (4.7%) fourth graders scored at the proficient level, and six (9.1%) fifth graders were proficient in reading (Figure 5). When the former cut scores used prior to 2012–13 were applied to this year's scale scores, seven (10.0%) third graders were advanced and 31 (44.3%) were proficient in reading, six (9.4%) fourth graders were at the advanced level and 33 (51.6%) were proficient, and eight (12.1%) fifth graders were advanced and 29 (43.9%) were proficient in reading (not shown).

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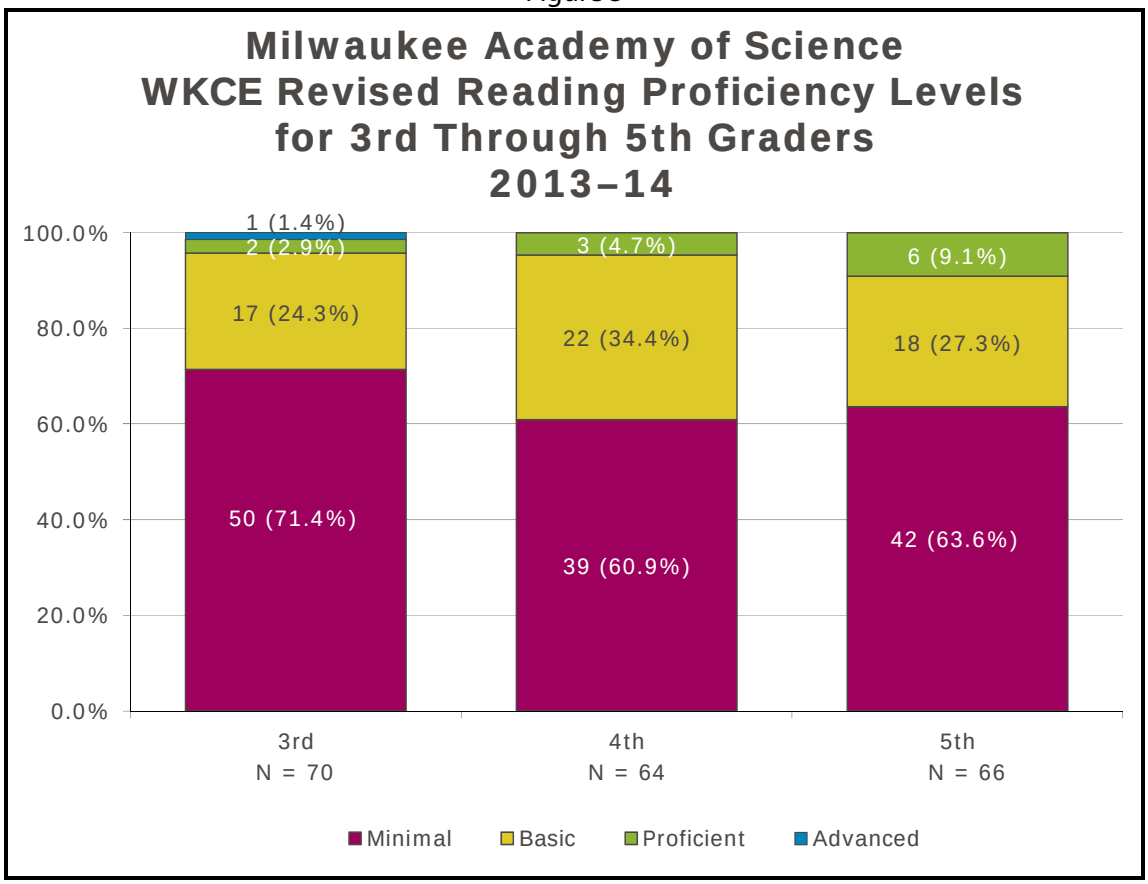
Figure 5



On average, MAS third-grade students scored in the 26th percentile statewide in reading; fourth-grade students scored in the 28th percentile; and fifth-grade students scored in the 28nd percentile (not shown).

In math, seven (10.0%) third-grade students, eight (12.5%) fourth-grade students, and five (7.6%) fifth-grade students reached the proficient level based on the revised cut scores (Figure 6). If the former cut scores were applied to this year's math scale scores, one (1.4%) third grader would have been in the advanced level, and 22 (31.4%) would have been proficient; four (6.3%) fourth graders would have been advanced, and 21 (32.8%) proficient; and three (4.5%) fifth graders would have been advanced, and 30 (45.5%) would have been proficient (not shown).

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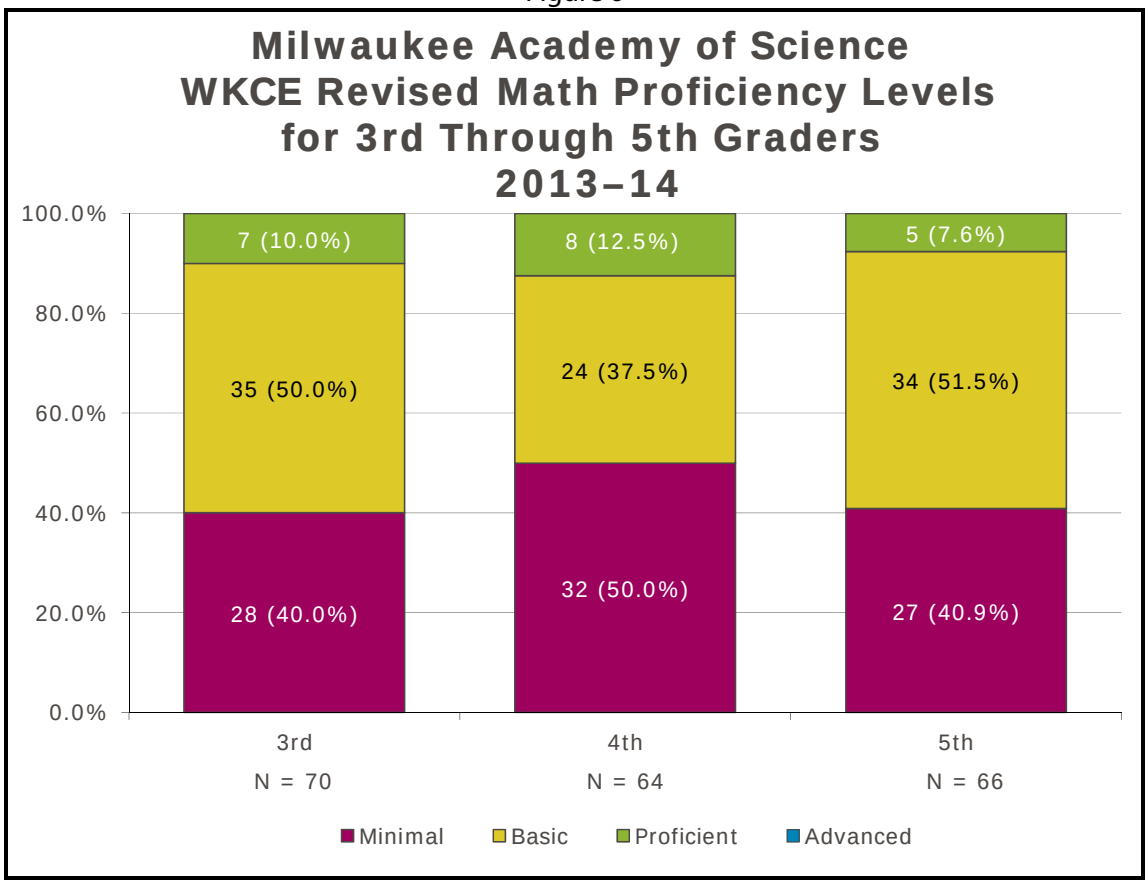
Figure 6



On average, MAS third-grade students scored in the 21st percentile statewide in math; fourth-grade students scored in the 21st percentile; and fifth-grade students scored in the 24th percentile (not shown).

Fourth-grade students also completed the WKCE language arts tests. There were four (6.3%) students in the advanced category and 23 (35.9%) students were proficient in language arts. Cut scores for the language arts test were not altered, so results from this year are comparable to those from prior years.

The final WKCE score is a writing score for fourth, eighth, and tenth graders. Each student's extended writing sample is scored using two holistic rubrics. A six-point composing rubric evaluates student ability to control purpose/focus, organization/coherence, development of content, sentence

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fluency, and word choice. A three-point conventions rubric evaluates student ability to use punctuation, grammar, capitalization, and spelling. Points received on these two rubrics are combined to produce a single score with a maximum possible score of nine.

The MAS fourth-grade extended writing scores ranged from two to six. The median score was five, meaning half of the students scored at or below five and half scored five or six on a scale of zero to nine.

2. Junior Academy: WKCE for Sixth Through Eighth Graders

CSRC required administration of the WKCE to all sixth- through eighth-grade students.[56] This section reflects results for all junior academy students who were administered the subtests, regardless of FAY status.

Sixth through eighth graders took the WKCE in October 2013. Eight (10.4%) sixth graders were proficient in reading based on the revised cut scores; seven (9.6%) seventh graders were proficient in reading; and one (1.3%) eighth grader was proficient and eight (10.7%) were proficient in reading (Figure 7). Had the former WKCE cut scores been used, 15 (19.5%) sixth graders would have been advanced and 39 (50.6%) would have been proficient in reading; 14 (19.2%) seventh graders would have been advanced and 44 (60.3%) proficient; and 12 (16.0%) eighth graders would have tested at the advanced level, and 36 (48.0%) would have been proficient in reading (not shown).

[56] The WKCE is also given to students in third, fourth, fifth, and tenth grades to test reading and math skills. Students in fourth, eighth, and tenth grades are also tested in language arts, science, and social studies.

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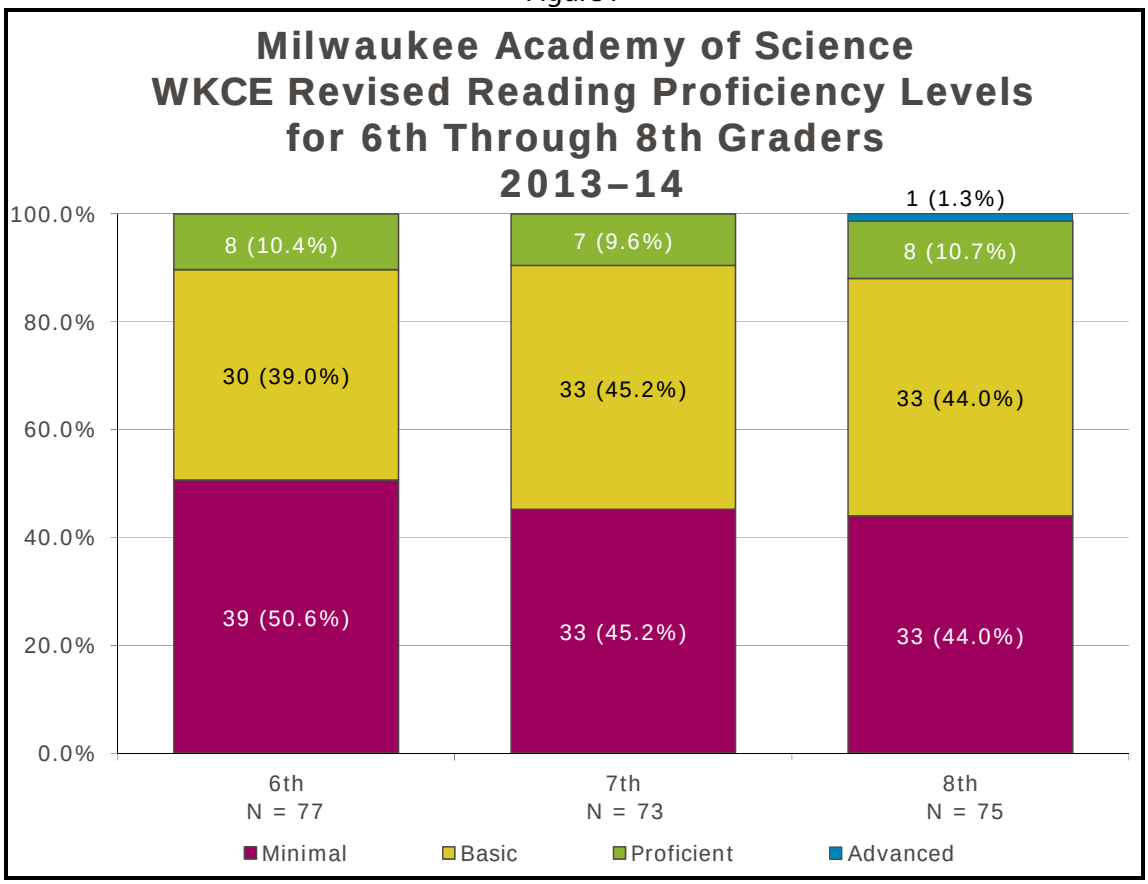
Figure 7



On average, MAS sixth-grade students scored in the 31st percentile statewide in reading; seventh-grade students scored in the 31st percentile; and eighth-grade students scored in the 32nd percentile (not shown).

In math, three (3.9%) sixth graders exhibited advanced skills and 14 (18.2%) were proficient in reading; three (4.1%) seventh graders were advanced and 13 (17.8%) were proficient; and six (8.0%) eighth graders were advanced and 26 (34.7%) were proficient in reading based on the revised cut scores (Figure 8). Had the former WKCE cut scores been applied this year, 15 (19.5%) sixth graders would have been advanced and 33 (42.9%) proficient, eight (11.0%) seventh graders would have been advanced and 50 (68.5%) proficient, and 19 (25.3%) eighth graders would have been advanced and 36 (48.0%) proficient in math (not shown).

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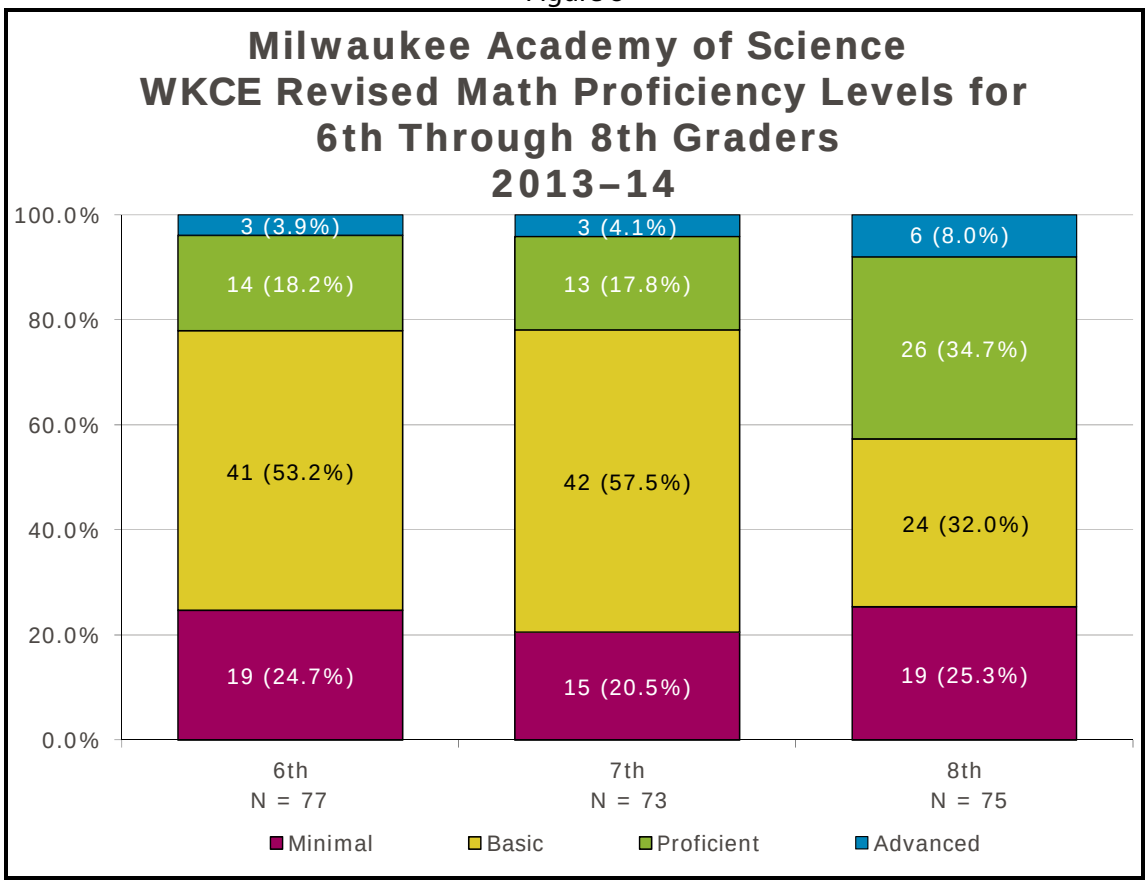
Figure 8



On average, MAS sixth-grade students scored in the 36th percentile statewide in math; seventh-grade students scored in the 36th percentile; and eighth-grade students scored in the 46th percentile (not shown).

Eighth-grade students also complete the language arts section of the WKCE. Results from the fall of 2013 indicate that eight (10.7%) eighth graders were advanced in language arts skills, and 17 (22.7%) were in the proficient range. Cut scores for the language arts test were not altered, so results from this year are comparable to those from prior years.

The final score from the WKCE is a writing score for fourth, eighth, and tenth graders. The extended writing sample is scored using two holistic rubrics that are similar to those used on the fourth-grade test. Points received on the two rubrics are combined to produce a single score on the

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report, with a maximum possible score of 9.[57] The MAS eighth-grade writing scores ranged from four to six. The median score was five, meaning half of the students scored at or below six and half scored at or above five on a scale of zero to nine.

3. High School

CSRC required that schools administer the EXPLORE to all ninth grade students, the WKCE and the PLAN to all tenth-grade students, and the ACT or SAT to all eleventh and twelfth graders.[58] The WKCE was described in an earlier section of this report.

The EXPLORE is the first in a series of two pre-ACT tests developed by ACT and is typically administered to students in eighth or ninth grade. The EXPLORE includes sections for English, math, reading, and science. EXPLORE scores provide information about students' knowledge, skills, interests, and plans. Students can use this information as they plan their high school coursework and begin thinking about college and careers. In addition to providing a score for each section, the EXPLORE provides a composite score for each student that reflects all the areas tested. Students can score between one and 25 on each section of the test; the composite score, which also ranges from one to 25, is an average of the scores from all four subtests.[59]

The PLAN, the second in the series of pre-ACT tests, is generally taken in tenth grade as a follow-up to the EXPLORE. Like the EXPLORE, the PLAN includes sections for English, math, reading, and science. PLAN results can be used as a guidance tool for students planning to attend college or join the workforce following graduation. It also has been shown to be a predictor of student success

[57] See http://oea.dpi.wi.gov/files/oea/pdf/wrtexem07.pdf for details.

[58] The WKCE is also given to students in third, fourth, and fifth grades to test reading and math skills. Students in fourth, eighth, and tenth grades are also tested in language arts, science, and social studies.

[59] Information found at www.act.org/explorestudent/score/index.html, July 2014.

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on the ACT. Students can score between one and 32 on each section of the test; the composite score, which also ranges from one to 32, is an average of the scores from all four subtests.[60]

In addition to providing information about students' skill levels in reading, math, English, and science, scores from the EXPLORE, PLAN, and ACT from consecutive years can be used to gauge student progress toward college readiness. ACT conducted a study to determine the relationship between scores on the EXPLORE, PLAN, and ACT with success in college courses. Based on that research, ACT set minimum scores on the English, math, reading, and science subtests for the EXPLORE, PLAN, and ACT that serve as benchmarks for success in college-level English composition, algebra, social sciences, and biology. Students who reach the benchmark or higher on the EXPLORE as ninth graders, the PLAN as tenth graders, and the ACT as eleventh or twelfth graders have a 50.0% chance of receiving at least a B in those college courses. Table 18 shows ACT's benchmark scores for each subtest on the EXPLORE and PLAN.[61] ACT does not publish composite benchmark scores for the EXPLORE and PLAN. CRC created composite benchmark scores for these tests by averaging the benchmark scores from the four subtests. The ACT composite benchmark, created using this same procedure, was published by ACT.

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[60] Information found at http://www.act.org/plan, July 2008.

[61] In the fall of 2013, ACT introduced new EXPLORE, PLAN, and ACT benchmarks for each subtest. However, because the year-to-year analysis in this report uses scores from the 2013–14 school year, CRC will continue to use the same benchmarks applied in past years. The new benchmarks will apply to ACT-based test scores in the 2014–15 reports.

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Table 18 ACT College Readiness Benchmarks for the EXPLORE and PLAN*			
Subtest	**EXPLORE Benchmark (9th Grade)**	**PLAN Benchmark (10th Grade)**	**ACT Benchmark (11th Grade)**
English	14	15	18
Math	18	19	22
Reading	16	17	21
Science	20	21	24
Composite**	17	18	21.25

*Reflects benchmarks used prior to the new study that was released in the fall of 2013.
**ACT does not publish a benchmark for the EXPLORE composite score; CRC calculated a composite benchmark equal to 17 by averaging the benchmark scores from the four subtests.

Results for the EXPLORE, PLAN, ACT, and tenth-grade WKCE are described in the following sections.

a. EXPLORE for Ninth Graders

All ninth graders were required to take the EXPLORE during October/November 2013, the same timeframe DPI established for the standardized WKCE. All students enrolled during the fall test period completed the EXPLORE. In addition to administering the EXPLORE in the fall of the school year to comply with the CSRC requirement, MAS also administered the test in the spring of 2014 to measure student progress from fall to spring. The following sections illustrate student performance relative to the ACT readiness benchmarks on each subtest and the composite score for all students who took the test in the fall and spring of the school year.

The number of students at or above the benchmark for each subtest and the composite score increased from the fall to spring EXPLORE (Table 19).

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Table 19 Milwaukee Academy of Science EXPLORE for 9th Graders Students at or Above Benchmark Fall 2013 and Spring 2014 (N = 62)				
Test Section	**Fall 2013**		**Spring 2014**	
	N	**%**	**N**	**%**
English	13	21.0%	24	38.7%
Math	8	12.9%	15	24.2%
Reading	7	11.3%	13	21.0%
Science	2	3.2%	5	8.1%
Composite*	7	11.3%	14	22.6%

*ACT does not publish a benchmark for the EXPLORE composite score; CRC calculated a composite benchmark equal to 17 by averaging the benchmark scores from the four subtests.

CRC examined student progress from the fall of 2013 to the spring of 2014 EXPLORE. The following sections describe progress for students who were at or above the benchmark on each of the four subtests and the composite score at the time of the fall test and progress for the students who were below benchmark at the time of the fall test.

i. Students at or Above Benchmarks on the Fall of 2013 EXPLORE Subtests

Of the 13 students at or above benchmark on the fall English subtest, 12 (92.3%) remained at or above benchmark on the spring test (Table 20). In order to protect student identity, CRC does not report results for cohorts with fewer than 10 students. Due to the small number of students who were at or above benchmark on the math, reading, and science subtests as well as the composite score, CRC could not include results in this report.

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Table 20 Milwaukee Academy of Science Progress for Students at or Above Benchmarks on the Fall 2013 EXPLORE (N = 62)				
Subtest	**Students at or Above Benchmark on the EXPLORE Fall 2013**		**Students Who Remained at or Above Benchmark on the EXPLORE Spring 2014**	
	N	**%**	**N**	**%**
English	13	21.0%	12	92.3%
Math	8	12.9%	Cannot report due to *n* size	
Reading	7	11.3%	Cannot report due to *n* size	
Science	2	3.2%	Cannot report due to *n* size	
Composite*	7	11.3%	Cannot report due to *n* size	

*ACT does not publish composite benchmark scores for the EXPLORE and PLAN. CRC created composite benchmark scores by averaging the benchmarks from the four subtests. The composite benchmark score for the ACT was published by ACT.

ii. Students Below Benchmarks on the Fall of 2013 EXPLORE Subtests

Next, CRC examined progress for students who were below the benchmark on the fall tests. More than half of the students made progress from fall to spring on each subtest and the composite score. For example, 53.1% of the students who were below the English benchmark in the fall met the spring benchmark or improved their score by at least one point. Of the 55 students who scored below a 17 on the fall composite, 30 (54.5%) scored a 17 or higher on the spring EXPLORE or improved their composite score by at least one point (Table 21).

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Table 21 Milwaukee Academy of Science Fall to Spring Student Progress: Fall 2013 to Spring 2014 EXPLORE for Students Below Benchmarks on the Fall 2013 EXPLORE								
Subtest	**Students Below Benchmark on the EXPLORE Fall 2013 (N = 62)**		**Students Who Achieved Benchmark on the EXPLORE Spring 2014**		**Students Who Did Not Achieve Benchmark but Increased at Least One Point on the EXPLORE Spring 2014**		**Overall Progress of Students Below Benchmark on the EXPLORE Fall 2013**	
	N	**%**	**N**	**%**	**N**	**%**	**N**	**%**
English	49	79.0%	12	24.5%	14	28.6%	**26**	**53.1%**
Math	54	87.1%	9	16.7%	20	37.0%	**29**	**53.7%**
Reading	55	88.7%	7	12.7%	26	47.3%	**33**	**60.0%**
Science	60	96.8%	3	5.0%	29	48.3%	**32**	**53.3%**
Composite*	55	88.7%	7	12.7%	23	41.8%	**30**	**54.5%**

*Note that ACT does not publish composite benchmark scores for the EXPLORE and PLAN. CRC created composite benchmark scores by averaging the benchmarks from the four subtests. The composite benchmark score for the ACT was published by ACT.

b. PLAN for Tenth Graders

All tenth-grade students were required to take the PLAN in the fall of 2013.[62] In addition to the fall PLAN, MAS administered the PLAN to tenth-grade students in the spring of 2014 in order to measure progress from fall to spring. The number of students at or above the benchmark for increased for each subtest and the composite score between fall and spring (Table 22).

[62] Of 48 students enrolled when the PLAN was administered in the fall, 46 completed the assessment; one of the students who did not withdrew from the school shortly after the PLAN was administered.

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Table 22 Milwaukee Academy of Science PLAN for 10th Graders Students At Or Above Benchmark Fall 2013 and Spring 2014 (N = 34)				
Test Section	**Fall 2013**		**Spring 2014**	
	N	**%**	**N**	**%**
English	20	58.8%	26	76.5%
Math	6	17.6%	9	26.5%
Reading	10	29.4%	13	38.2%
Science	0	0.0%%	3	8.8%
Composite*	11	32.4%	13	38.2%

*ACT does not publish a benchmark for the PLAN composite score; CRC calculated a composite benchmark equal to 18 by averaging the benchmark scores from the four subtests.

CRC also examined student progress from the fall of 2013 to the spring of 2014 PLAN. The following sections describe progress for students who were at or above the benchmark on each of the four subtests at the time of the fall PLAN and for students who were below benchmark on the four subtests at the time of the fall PLAN.

i. Students at or Above Benchmarks on the Fall of 2013 PLAN Subtests

Of the 15 students who were at or above the English benchmark in the fall, 18 (90.0%) remained at or above benchmark on the spring test. In order to protect student identity, CRC does not report results for cohorts with fewer than 10 students. Therefore, due to the small number of students who were at or above benchmarks on the other fall tests, CRC could not include results in this report.

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Table 23 Milwaukee Academy of Science Progress for Students at or Above Benchmarks on the Fall 2013 PLAN (N = 34)				
Subtest	**Students at or Above Benchmark on the PLAN Fall 2013**		**Students Who Remained at or Above Benchmark on the PLAN Spring 2014**	
	N	**%**	**N**	**%**
English	20	58.8%	18	90.0%
Math	6	17.6%	Cannot report due to *n* size	
Reading	10	29.4%	8	80.0%
Science	0	0.0%%	Cannot report due to *n* size	
Composite*	11	32.4%	10	90.9%

*Note that ACT does not publish composite benchmark scores for the EXPLORE and PLAN. CRC created composite benchmark scores by averaging the benchmarks from the four subtests. The composite benchmark score for the ACT was published by ACT.

ii. Students Below Benchmarks on the Fall of 2013 PLAN Subtests

Next, CRC examined progress for students who were below the benchmark on the fall tests. More than half of the students made progress from fall to spring on the English, math, and reading subtests and over 40% improved on the science subtest and the composite score. For example, 85.7% of the students who were below the English benchmark in the fall met the spring benchmark or improved their score by at least one point. Of the 23 students who scored below 18 on the fall composite, 11 (47.8%) scored 18 or higher on the spring PLAN or improved their composite score by at least one point (Table 24).

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Table 24 Milwaukee Academy of Science Fall to Spring Student Progress: Fall 2013 to Spring 2014 PLAN for Students Below Benchmarks on the Fall 2013 PLAN								
Subtest	**Students Below Benchmark on the PLAN Fall 2013 (N = 34)**		**Students Who Achieved Benchmark on the PLAN Spring 2014**		**Students Who Did Not Achieve Benchmark but Increased at Least One Point on the PLAN Spring 2014**		**Overall Progress of Students Below Benchmark on the PLAN Fall 2013**	
	N	**%**	**N**	**%**	**N**	**%**	**N**	**%**
English	14	41.2%	8	57.1%	4	28.6%	**12**	**85.7%**
Math	28	82.4%	5	17.9%	10	35.7%	**15**	**53.6%**
Reading	24	70.6%	5	20.8%	9	37.5%	**14**	**58.3%**
Science	34	100.0%	3	8.8%	12	35.3%	**15**	**44.1%**
Composite*	23	67.6%	3	13.0%	8	34.8%	**11**	**47.8%**

*Note that ACT does not publish composite benchmark scores for the EXPLORE and PLAN. CRC created composite benchmark scores by averaging the benchmarks from the four subtests. The composite benchmark score for the ACT was published by ACT.

c. WKCE for Tenth Graders

In October 2013, 43 tenth graders took the WKCE. Based on the revised cut scores, two (4.7%) students were advanced and 11 (25.6%) were proficient in reading, five (11.6%) were advanced and 24 (55.8%) were proficient in language arts, and one (2.3%) student was advanced and six (14.0%) were proficient in math (Figure 9).

If the former cut scores, used prior to 2012–13, were applied to this year's scale scores, 17 (39.5%) 10th graders would have been advanced and 11 (25.6%) proficient in reading, and three (7.0%) students would have been advanced and 22 (51.2%) proficient in math (not shown).

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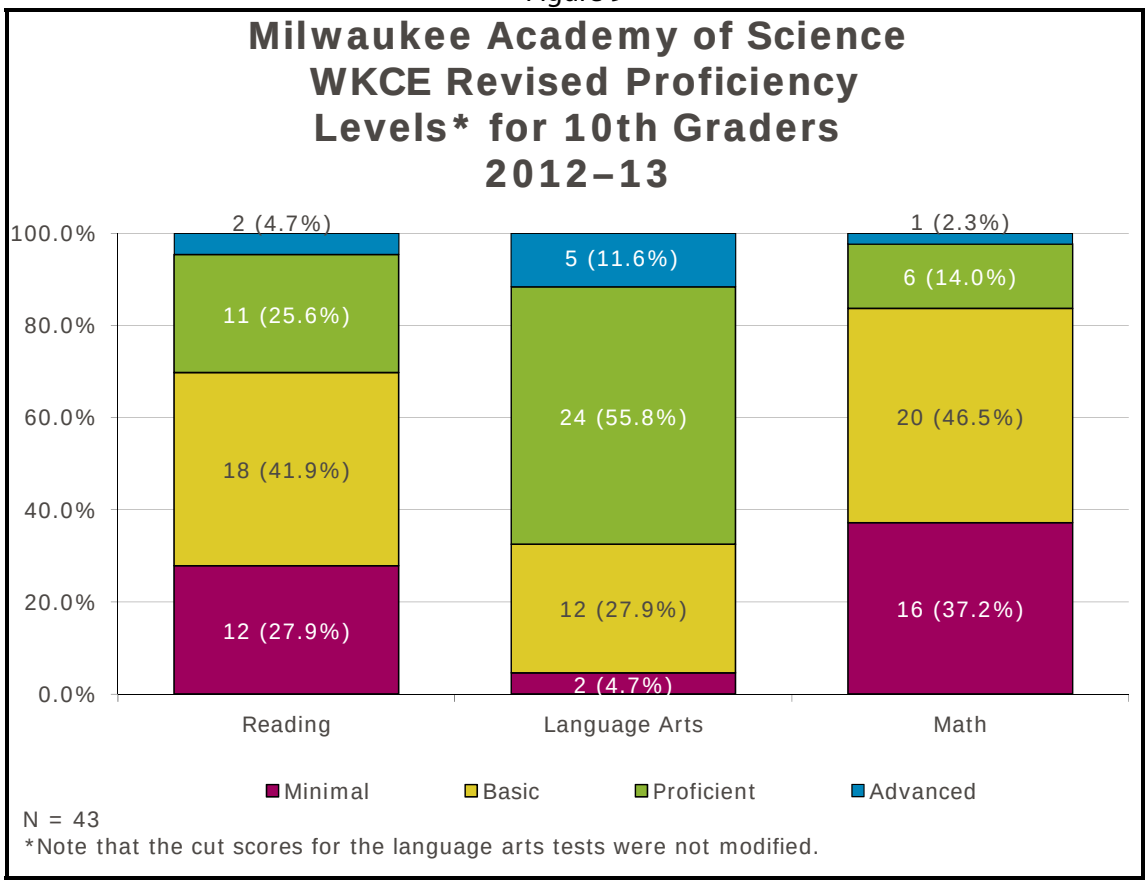
Figure 9



On average, MAS tenth-grade students scored in the 41st percentile statewide in reading and in the 33rd percentile in math (not shown).

Tenth-grade writing scores ranged from four to eight. The median score was six, meaning half of the students scored at or below six, and half scored at or above six on a scale of zero to nine.

d. ACT or SAT for Eleventh and Twelfth Graders

The final CSRC expectation was that all eleventh and twelfth graders would take the ACT or SAT. Eleventh graders were to have taken the test by the end of the school year; twelfth graders were to have taken the test in the fall of their senior year. There were 21 twelfth graders enrolled at the end of the school year; 14 of those students completed the ACT in the fall and six completed it sometime

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during the spring semester. One student signed up three times but did not complete the test. Of the 39 eleventh graders enrolled at the end of the year, 38 completed the ACT during the school year or in June 2014; one student signed up twice but did not complete the ACT.[63]

Composite ACT scores for eleventh graders ranged from 11 to 23, with an average of 15.7. For twelfth graders, composite scores ranged from 11 to 23, with an average of 15.6. Overall, eleventh and twelfth graders scored, on average, 15.6 points (not shown). Four (10.5%) eleventh graders and one (5.0%) twelfth grader scored at or above the ACT composite benchmark of 21.25 (21 when rounding; Table 25).

Table 25

Milwaukee Academy of Science
ACT Scores for 11th and 12th Graders
2013–14

ACT Test Subject	Minimum	Maximum	Average	Students at or Above Benchmark	
				N	%
11th Grade (N = 38)					
English	7	22	14.0	7	18.4%
Math	10	27	16.1	2	5.3%
Reading	9	24	15.8	3	7.9%
Science	11	23	16.4	0	0.0%
Composite	11	23	15.7	4	10.5%
12th Grade (N = 20)					
English	10	23	14.6	3	15.0%
Math	9	25	16.0	1	5.0%
Reading	11	21	15.7	1	5.0%
Science	9	24	15.4	1	5.0%
Composite	11	23	15.6	1	5.0%

[63] One student took the SAT this year in addition to the ACT.

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G. Multiple-Year Student Progress

Year-to-year progress is measured by comparing scores on standardized tests from one year to the next. Year-to-year progress expectations apply to all students with scores in consecutive years. Prior to the 2013–14 school year, first- through third-grade skills were assessed based on the Stanford Diagnostic Reading Test (SDRT). The SDRT was discontinued for the 2013–14 school year; therefore, year-to-year results are not available. Schools began using the PALS reading assessment this year; CRC and the CSRC are exploring options for using this as a year-to-year measure in subsequent years.

Fourth- through eighth-grade reading and math skills are tested on the WKCE. Year-to-year progress expectations apply to students who have been enrolled at the school for a full academic year. Beginning in 2012–13, WKCE progress was measured using the revised cut scores (i.e., those implemented in 2012–13) and the former cut scores (i.e., those used prior to the 2012–13 school year).

Progress toward college readiness from ninth to tenth grade is assessed using benchmarks from the EXPLORE and PLAN tests, and progress from tenth to eleventh grade is assessed using benchmarks from the PLAN and ACT tests. CSRC requires that multiple-year progress be reported for students who met proficiency-level expectations (i.e., scored at proficient or advanced levels) and for those students who did not meet proficiency-level expectations (i.e., tested at minimal or basic levels) in the 2012–13 school year.

CSRC's WKCE expectations are that at least 75.0% of the students who were at the proficient or advanced levels on the previous year's WKCE reading and math subtests, and who met the FAY definition, maintain their status of proficient or above.[64] For students who scored below expectations, i.e., at the minimal or basic levels on their previous year's WKCE reading or math tests, the expectation

[64] CSRC's WKCE expectations are based on the former WKCE cut scores because the revised cut scores have been in place for too short a period for the development of valid expectations.

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is that at least 60.0% of students would either advance to the next proficiency level or advance to the next highest quartile within their previous year's proficiency level.[65]

Finally, expectations related to the EXPLORE, PLAN, and ACT are that at least 75.0% of the students at benchmark in any of the subtest areas or the composite score will maintain that status on the next test in the series (e.g., EXPLORE to PLAN and PLAN to ACT). It is expected that at least 60.0% of the students below benchmark in any of the subtest areas or composite score will reach benchmark or increase their score by at least one point on the next test in the series the following year.

1. Multiple-Year Student Progress for Fourth Through Eighth Graders Using Former WKCE Cut Scores

Until the current school year, WKCE proficiency levels were based on cut scores developed by the state that aligned with state reading and math standards. In 2012–13, the state began using revised cut scores that are based on those used by NAEP and more closely align with national and international standards. Although progress will be measured using both former and revised cut scores, CSRC's expectations for year-to-year growth are based on trends in student progress using the former cut scores. The revised cut scores have been in place too short a time to develop valid standards. In order to measure progress using the former scores, the former proficiency-level cut scores and quartiles were applied to the scale scores for the 2012–13 and 2013–14 school years. This section describes progress from last year to this year using the former cut scores; the following section will describe progress using the revised cut scores.

a. Students Who Met Proficiency-Level Expectations (Former Cut Scores)

Based on fall of 2012 WKCE data, 195 students were proficient or advanced in reading and 173 were proficient or higher in math, based on the former cut scores. Most (86.7%) of students

[65] Students had to be enrolled in the school on or before September 19, 2013, to meet the FAY definition.

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maintained their reading levels and 91.3% maintained proficient or advanced levels in math, exceeding the CSRC expectation of 75.0% (Tables 26 and 27).

Table 26

Milwaukee Academy of Science
Reading Proficiency-Level Progress
for Students Proficient or Advanced in 2012–13
Based on Former WKCE Proficiency-Level Cut Scores

Grade	Students Proficient/Advanced in 2012–13	Students Maintained Proficient/Advanced in 2013–14	
		N	%
3rd to 4th	23	20	87.0%
4th to 5th	35	28	80.0%
5th to 6th	48	41	85.4%
6th to 7th	45	44	97.8%
7th to 8th	44	36	81.8%
Total	**195**	**169**	**86.7%**

Table 27

Milwaukee Academy of Science
Math Proficiency-Level Progress
for Students Proficient or Advanced in 2012–13
Based on Former WKCE Proficiency-Level Cut Scores

Grade	Students Proficient/Advanced in 2012–13	Students Maintained Proficient/Advanced in 2013–14	
		N	%
3rd to 4th	17	15	88.2%
4th to 5th	22	18	81.8%
5th to 6th	40	36	90.0%
6th to 7th	52	50	96.2%
7th to 8th	42	39	92.9%
Total	**173**	**158**	**91.3%**

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b. Students Who Did Not Meet Proficiency-Level Expectations (Former Cut Scores)

To determine whether students who did not meet proficient or advanced levels were making progress, CRC examined whether these students were able to improve scores by moving up one or more categories, e.g., minimal to basic, basic to proficient, or minimal to proficient. If students were not able to improve by a level, CRC examined student progress within their individual skill level. To examine movement within a proficiency level, CRC equally divided the minimal and basic levels into quartiles. The lower threshold for the minimal level was the lowest scale score possible on the examination. The lower threshold for the basic level and the upper threshold for both levels reflected the scale scores used by DPI to establish proficiency levels.[66]

There were 73 students who scored in the minimal or basic categories in 2012–13 based on the former proficiency-level cut scores. Of these, 39.7% showed improvement by progressing to a higher proficiency level (N = 15) or quartile (N = 14) in reading (Table 28). The CSRC expectation is that at least 60.0% of students will show progress; therefore, MAS did not meet this expectation.

Table 28

Milwaukee Academy of Science
Reading Proficiency-Level Progress
for Students Minimal or Basic in 2012–13
Based on Former WKCE Proficiency-Level Cut Scores

Grade	# Students Minimal/Basic 2012–13	# Students Who Advanced One Proficiency Level 2013–14	If Not Advanced, # Who Improved Quartile(s) Within Proficiency Level 2013–14	Total Proficiency-Level Advancement	
				N	%
3rd to 4th	19	4	3	**7**	**36.8%**
4th to 5th	16	3	4	**7**	**43.8%**
5th to 6th	13	1	1	**2**	**15.4%**
6th to 7th	16	6	3	**9**	**56.3%**
7th to 8th	9	Cannot report due to *n* size			
Total	**73**	**15**	**14**	**29**	**39.7%**

[66] This method is used by CRC to examine student progress in the schools chartered by the city.

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There were 95 students who scored below proficient on the fall of 2012 WKCE. Overall, 44.2% of those students either advanced one proficiency level (N = 38) or, if they did not advance a level, improved at least one quartile within their level (N = 4; Table 29). The CSRC expectation is that at least 60.0% of students will show progress; therefore, MAS did not meet this expectation.

Table 29

Milwaukee Academy of Science
Math Proficiency-Level Progress
for Students Minimal or Basic in 2012–13
Based on Former WKCE Proficiency-Level Cut Scores

Grade	# Students Minimal/Basic 2012–13	# Students Who Advanced One Proficiency Level 2013–14	If Not Advanced, # Who Improved Quartile(s) Within Proficiency Level 2013–14	Total Proficiency-Level Advancement	
				N	%
3rd to 4th	25	1	0	**1**	**4.0%**
4th to 5th	29	14	2	**16**	**55.2%**
5th to 6th	21	12	1	**13**	**61.9%**
6th to 7th	9	Cannot report due to *n* size			
7th to 8th	11	7	0	**7**	**63.6%**
Total	**95**	**38**	**4**	**42**	**44.2%**

2. <u>Multiple-Year Student Progress for Fourth Through Eighth Graders Using Revised Cut Scores</u>

The previous section described progress for students from 2012–13 to 2013–14 using former WKCE proficiency-level cut scores (i.e., those used until the current school year). This section describes progress for these same students using the revised proficiency-level cut scores that were implemented in 2012–13. It is important to note that the range of scale scores used to assign the proficiency level differ from the ranges using the former cut scores; therefore, it may not be possible to directly compare results using the two different models. The results described in this section simply provide a look at student progress using the revised cut scores.

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a. Students Who Met Proficiency-Level Expectations (Revised Cut Scores)

Based on fall of 2012 WKCE data, 23 students reached proficiency in reading when revised cut scores were applied and 66 were proficient or higher in math. More than half (56.5%) of the students maintained their reading levels, and 75.8% maintained proficient or advanced levels in math (Tables 30 and 31).

Table 30

Milwaukee Academy of Science
Reading Proficiency-Level Progress
for Students Proficient or Advanced in 2012–13
Based on Revised WKCE Proficiency-Level Cut Scores

Grade	Students Proficient/Advanced in 2012–13	Students Maintained Proficient/Advanced in 2013–14	
		N	%
3rd to 4th	3	Cannot report due to *n* size	
4th to 5th	3	Cannot report due to *n* size	
5th to 6th	6	Cannot report due to *n* size	
6th to 7th	4	Cannot report due to *n* size	
7th to 8th	7	Cannot report due to *n* size	
Total	**23**	**13**	**56.5%**

Table 31

Milwaukee Academy of Science
Math Proficiency-Level Progress
for Students Proficient or Advanced in 2012–13
Based on Revised WKCE Proficiency-Level Cut Scores

Grade	Students Proficient/Advanced in 2012–13	Students Maintained Proficient/Advanced in 2013–14	
		N	%
3rd to 4th	5	Cannot report due to *n* size	
4th to 5th	5	Cannot report due to *n* size	
5th to 6th	17	14	82.4%
6th to 7th	21	14	66.7%
7th to 8th	18	16	88.9%
Total	**66**	**50**	**75.8%**

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b. Students Who Did Not Meet Proficiency-Level Expectations (Revised Cut Scores)

To determine whether students who did not meet proficient or advanced levels were making progress, CRC examined whether these students were able to improve scores by moving up one or more categories, e.g., minimal to basic, basic to proficient, or minimal to proficient. If students were not able to improve by a level, CRC examined student progress within their individual skill level. To examine movement within a proficiency level, CRC equally divided the minimal and basic levels into quartiles. The lower threshold for the minimal level was the lowest scale score possible on the examination. The lower threshold for the basic level and the upper threshold for both levels reflected the scale scores used by DPI to establish proficiency levels.[67]

There were 245 students who scored in the minimal or basic categories in 2012–13 based on the revised proficiency-level cut scores. Of these, 33.8% showed improvement by progressing to a higher proficiency level (N = 34) or quartile (N = 49) in reading (Table 32).

Table 32

Milwaukee Academy of Science
Reading Proficiency-Level Progress
for Students Minimal or Basic in 2012–13
Based on Revised WKCE Proficiency-Level Cut Scores

Grade	# Students Minimal/Basic 2012–13	# Students Who Advanced One Proficiency Level 2013–14	If Not Advanced, # Who Improved Quartile(s) Within Proficiency Level 2013–14	Total Proficiency-Level Advancement	
				N	%
3rd to 4th	39	2	8	**10**	**25.6%**
4th to 5th	48	9	5	**14**	**29.2%**
5th to 6th	55	4	10	**14**	**25.5%**
6th to 7th	57	13	16	**29**	**50.9%**
7th to 8th	46	6	10	**16**	**34.8%**
Total	**245**	**34**	**49**	**83**	**33.8%**

[67] This method is used by CRC to examine student progress in the schools chartered by the city.

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When the revised cut scores were applied to the 2012–13 WKCE math scale scores, 202 students scored below proficient. Overall, 34.6% of those students either advanced one proficiency level (N = 35) or, if they did not advance a level, improved at least one quartile within their level (N = 35; Table 33).

Table 33

Milwaukee Academy of Science
Math Proficiency-Level Progress
for Students Minimal or Basic in 2012–13
Based on Revised WKCE Proficiency-Level Cut Scores

Grade	# Students Minimal/Basic 2012–13	# Students Who Advanced One Proficiency Level 2013–14	If Not Advanced, # Who Improved Quartile(s) Within Proficiency Level 2013–14	Total Proficiency-Level Advancement	
				N	%
3rd to 4th	37	2	3	**5**	**13.5%**
4th to 5th	46	11	12	**23**	**50.0%**
5th to 6th	44	4	6	**10**	**22.7%**
6th to 7th	40	2	4	**6**	**15.0%**
7th to 8th	35	16	10	**26**	**74.3%**
Total	**202**	**35**	**35**	**70**	**34.6%**

3. Benchmark Progress From the Fall of 2012 EXPLORE to the Fall of 2013 PLAN

Students in ninth grade at MAS during the 2012–13 school year took the EXPLORE in the fall of 2012. Those same ninth-grade students who were enrolled as tenth graders at MAS during 2013–14 took the PLAN during the fall of 2013. Students, parents, and teachers can use scores from each year to determine areas in which students may need additional assistance.

Using the minimum benchmark scores for each subject area (see Table 18) on the EXPLORE, CRC examined student progress from ninth to tenth grade. There were 33 MAS students who took the EXPLORE in the fall of 2012 as ninth graders and the PLAN in the fall of 2013 as tenth graders. Of those students, 15 (45.5%) were at or above the English benchmark, six (18.2%) were at or above the

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benchmark in math, seven (21.2%) were at or above the benchmark for reading, and three (9.1%) were at or above the benchmark for science at the time of the fall of 2012 EXPLORE. Five (15.2%) students achieved a composite score of 17 or higher. The following sections describe progress for students who were at or above the EXPLORE benchmark for each test and students who were below the benchmark at the time of the fall of 2012 test.

a. Students at or Above Benchmarks on the EXPLORE Subtests

Of the 15 students who were at or above the EXPLORE English benchmark, two thirds (66.7%) maintained benchmark on the PLAN English test. This falls below the CSRC expectation that 75.0% of students maintain benchmark. In order to protect student identity, CRC does not report results for cohorts with fewer than 10 students. Therefore, due to the small number of students who were at or above benchmark for the other tests, CRC could not include results in this report (Table 34).

Table 34

Milwaukee Academy of Science
Progress for Students at or Above Benchmarks on the Fall of 2012 EXPLORE
(N = 33)

Subtest	Students at or Above Benchmark on the EXPLORE Fall 2012		Students Who Remained at or Above Benchmark on the PLAN Fall 2013	
	N	%	N	%
English	15	45.5%	10	66.7%
Math	6	18.2%	Cannot report due to *n* size	
Reading	7	21.2%	Cannot report due to *n* size	
Science	3	9.1%	Cannot report due to *n* size	
Composite*	5	15.2%	Cannot report due to *n* size	

*ACT does not publish a benchmark for the EXPLORE or PLAN composite score; CRC calculated a composite benchmark equal to 17 for the EXPLORE and 18 for the PLAN by averaging the benchmark scores from the four subtests.

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b. Students Below Benchmarks on the EXPLORE Subtests

More than 60.0% of students progressed on each of the subtests and the composite score (Table 35). Therefore, MAS met CSRC's expectation related to the EXPLORE and PLAN.

Table 35

Milwaukee Academy of Science
Year-to-Year Student Progress: EXPLORE to PLAN
Progress for Students Below Benchmarks on the Fall of 2012 EXPLORE

Subtest	Students Below Benchmark on the EXPLORE Fall 2012 (N = 33)		Students Who Achieved Benchmark on the PLAN Fall 2013		Students Who Did Not Achieve Benchmark But Increased at Least One Point on the PLAN Fall 2013*		Overall Progress of Students Below Benchmark on the EXPLORE Fall 2012	
	N	%	N	%	N	%	N	%
English	18	54.5%	6	33.3%	9	50.0%	**15**	**83.3%**
Math	27	81.8%	2	7.4%	16	59.3%	**18**	**66.7%**
Reading	26	78.8%	3	11.5%	16	61.5%	**19**	**73.1%**
Science	30	90.9%	0	0.0%	19	63.3%	**19**	**63.3%**
Composite**	28	84.8%	5	17.9%	18	64.3%	**23**	**82.1%**

*Scores on the EXPLORE and PLAN are scaled so that a score on the EXPLORE represents the same level of skill as the same score on the PLAN. Therefore, a score increase in one subject from the EXPLORE to the PLAN demonstrates progress in that subject area from one year to the next.
**ACT does not publish a benchmark for the EXPLORE or PLAN composite score; CRC calculated a composite benchmark equal to 17 for the EXPLORE and 18 for the PLAN by averaging the benchmark scores from the four subtests.

4. <u>Benchmark Progress From the 2011/2012 PLAN to the 2013–14 ACT</u>

Students in tenth grade at MAS during the 2011–12 or 2012–13 school years took the PLAN in the fall semester. Those same tenth-grade students who were enrolled as eleventh or twelfth graders at MAS during 2013–14 took the ACT sometime during the year.

Using the minimum benchmark scores for each subject area (shown earlier in this report) on the PLAN, CRC examined student progress from tenth to eleventh grade or twelfth grade. There were 52 MAS students who took the PLAN in the fall of 2011 or 2012 and the ACT in the 2013–14 school

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year. Of those students, 17 (32.7%) were at or above the English benchmark, four (7.7%) were at or above the benchmark in math, seven (13.5%) were at or above the reading benchmark, and none of the students were at or above the benchmark in science at the time of the fall of 2011 or 2012 PLAN. Five (9.6%) students scored an 18 or higher composite score on the fall of 2011 or 2012 PLAN. The following sections describe progress for students who were at or above the PLAN benchmark for each test and students who were below the benchmark at the time of the fall of 2011 or 2012 test.

a. Students at or Above Benchmarks on the 2011/2012 PLAN Subtests

CRC first examined scores for the 17 students who were at or above the English benchmark on the fall of 2011 or 2012 PLAN; seven (41.2%) maintained benchmark on the 2012–13 ACT (Table 36). This falls short of the CSRC expectation that 75.0% of students maintain benchmark. In order to protect student identity, CRC does not report results for cohorts with fewer than 10 students. Therefore, due to the small number of students who were at or above benchmark in reading, math, or science subtests or the composite score, CRC could not include the number of students who remained at or above the benchmark on each test in this report.

Table 36

Milwaukee Academy of Science
Year-to-Year Student Progress: PLAN to ACT Results
Progress for Students at or Above Benchmarks on the 2011/2012 PLAN
(N = 52)

Subtest	Students at or Above Benchmark on the PLAN Fall 2011/2012		Students Who Remained at or Above Benchmark on the ACT 2013–14	
	N	%	N	%
English	17	32.7%	7	41.2%
Math	4	7.7%	Cannot report due to *n* size	
Reading	7	13.5%	Cannot report due to *n* size	
Science	0	0.0%	Cannot report due to *n* size	
Composite*	5	9.6%	Cannot report due to *n* size	

*The PLAN does not have a composite benchmark score. CRC created a PLAN composite benchmark score by averaging the benchmark scores for the four subtests.

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b. Students Below Benchmarks on 2011/2012 PLAN Subtests

Next, CRC examined progress for students below benchmarks on each of the fall 2011/2012 PLAN subtests. More than 60% of students showed progress on each of the English, math, and reading subtests and 59.6% showed progress on the composite score. Only 46.1% of students progressed on the science subtest from the PLAN to the ACT. The school has therefore met the 60% expectation for English, math, and reading but not the science subtest or the composite score.

Table 37

Milwaukee Academy of Science
Year-to-Year Student Progress: PLAN to ACT
Progress for Students Below Benchmarks on the 2011/2012 PLAN

Subtest	Students Below Benchmark on the PLAN Fall 2011/2012 (N = 52)		Students Who Achieved Benchmark on the ACT 2013–14		Students Who Did Not Achieve Benchmark But Increased at Least One Point on the ACT 2013–14*		Overall Progress of Students Below Benchmark on the PLAN 2011/2012	
	N	%	N	%	N	%	N	%
English	35	67.3%	2	5.7%	22	62.9%	**24**	**68.6%**
Math	48	92.3%	0	0.0%	29	60.4%	**29**	**60.4%**
Reading	45	86.5%	1	2.2%	29	64.4%	**30**	**66.7%**
Science	52	100.0%	1	1.9%	23	44.2%	**24**	**46.1%**
Composite**	47	90.4%	0	0.0%	28	59.6%	**28**	**59.6%**

*Scores on the PLAN and ACT are scaled so that a score on the PLAN represents the same level of skill as the same score on the ACT. Therefore, a score increase in one subject from the PLAN to the ACT demonstrates progress in that subject area from one year to the next.
**There is no composite benchmark score for the PLAN. CRC created a PLAN composite benchmark by averaging the benchmark scores for the four subtests.

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H. CSRC School Scorecard

In the 2009–10 school year, CSRC piloted a scorecard for each school that it charters. The pilot ran for three years, from 2009–10 through 2011–12. In the fall of 2012, CSRC formally adopted the scorecard to help monitor school performance. The scorecard includes multiple measures of student academic progress, such as performance on standardized tests and local measures. It also includes point-in-time academic achievement and engagement elements such as attendance and student and teacher retention and return. The score provides a summary indicator of school performance. The summary score is then translated into a school status rating (Table 38).

Table 38

City of Milwaukee
Educational Performance Rating Scale for Charter Schools

School Status	Scorecard % Total
High Performing/Exemplary	100.0%–85.0%
Promising/Good	84.0%–70.0%
Problematic/Struggling	69.0%–55.0%
Poor/Failing	54.9% or less

CSRC uses the score and rating, along with additional criteria, to guide decisions regarding whether to accept a school's annual education performance and continue monitoring as usual and whether to recommend a school for a five-year contract renewal at the end of its fourth year of operation under its current contract. The CSRC expectation is that schools achieve a rating of 70.0% or more; if a school falls under 70.0%, CSRC will carefully review the school's performance and determine whether a probationary plan should be developed.

This year, CRC prepared a K4 through eighth grade scorecard and a high school scorecard reflecting the WKCE results using the former proficiency-level cut scores used until the 2012–13 school year. The school scored 72.2% percent on the K4 through eighth grade scorecard and 78.1% on the

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high school scorecard. This compares to 73.2% and 77.1% on the school's 2012–13 scorecards. See Appendix D for school scorecard information.

Additionally, for schools with students in kindergarten through eighth grade and high schools, CRC calculated a weighted average score for the entire school (kindergarten through twelfth grade). The weighted average is simply a measure that takes into consideration the number of students to which they were applied. CRC assigned the weight of each individual report card's score based on the number of students enrolled in the elementary/junior academy and the high school at the end of the school year. When combined, MAS had an overall, weighted average score of 73.3% [68]

I. Wisconsin DPI School Report Card[69]

As part of the new state accountability system reflected in Wisconsin's approved Elementary and Secondary Education Act Flexibility Request,[70] the DPI has produced report cards for every school in Wisconsin. These school report cards provide data on multiple indicators for four priority areas.

- **Student Achievement**—Performance on the WKCE and the Wisconsin Alternative Assessment for Students with Disabilities in reading and mathematics.
- **Student Growth**—Improvement over time on the WKCE in reading and mathematics.
- **Closing Gaps**—Progress of student subgroups in closing gaps in reading and mathematics performance and/or graduation rates.
- **On-Track and Postsecondary Readiness**—Performance on key indicators of readiness for graduation and postsecondary pursuits, whether college or career.

[68] Of the 889 students enrolled at the end of the school year, 82.1% were in K4 through eighth grades and 17.9% were in high school. Those percents were used to calculate the weighted scorecard percents.

[69] Information for this section was retrieved from the DPI website, http://reportscards.dpi.wi.gov. The DPI report card reflects the school's performance for the 2012–13 school year. Report cards for the 2013–14 school year will be issued in the fall of 2014.

[70] Wisconsin DPI, retrieved from http://acct.dpi.wi.gov/acct_accountability

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Schools receive a score from 0 to 100 for each priority area. Scores for each area are included on each school's report card. The report cards are public documents and can be found on the DPI website. Some schools have had data replaced by an asterisk (*) because there are fewer than 20 students in a group.

In addition to priority area scores, performance on three student engagement indicators is reported. These include test participation rate (goal of 95.0% for all students and each subgroup), absenteeism rate (goal of 13.0% or less), and dropout rate (goal of 6.0% or less). Schools that do not meet the goals receive point deductions from their overall scores.

The overall accountability score is an average of the priority area scores, minus student engagement indicator deductions. The average is weighted differently for schools that cannot be measured with all priority area scores. A school's overall accountability score places the school into one of five overall accountability ratings.

- Significantly Exceeds Expectations (83.0–100.0)
- Exceeds Expectations (73.0–82.9)
- Meets Expectations (63.0–72.9)
- Meets Few Expectations (53.0–62.9)
- Fails to Meet Expectations (0.0–52.9)

MAS's 2012–13 report card indicated an overall accountability rating of 58.4 points, resulting in a rating of Meets Few Expectations. Further information on the MAS report card is included in Appendix E.

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IV. SUMMARY AND RECOMMENDATIONS

This report covers the sixth year of MAS's operation as a City of Milwaukee charter school. The school has met all but five provisions of its contract with the City of Milwaukee and the subsequent CSRC requirements. One provision was substantially met and another was partially met. In addition, the school scored 72.2% on K4 through eighth grade scorecard and 78.1% on the high school scorecard using the former WKCE cut scores. When combined, MAS had an overall, weighted average score of 73.3%. Based on current and past contract compliance and the scorecard results, CRC's recommendation is that MAS continue regular, annual academic monitoring and reporting.

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Appendix A

Contract Compliance Chart

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Milwaukee Academy of Science Overview of Compliance for Education-Related Contract Provisions 2013–14			
Section of Contract	**Education-Related Contract Provision**	**Report Reference Page(s)**	**Contract Provision Met or Not Met**
Section I, B	Description of educational program; student population served.	2–5 and 18–21	Met
Section I, V	School will provide a copy of the calendar prior to the end of the previous school year.	12	Met
Section I, C	Educational methods.	2–5	Met
Section I, D	Administration of required standardized tests: a. 1st through 8th grades; and b. 9th through 12th grades.	 48–59 59–69	 a. Met b. Substantially met[71]
Section I, D	All new high school students tested within 30 days of first day of attendance in reading and math.	40–41, 43	Met
Section I, D	Written annual plan for graduation.	45–46	Met
Section I, D	Academic criterion #1: Maintain local measures, showing pupil growth in demonstrating curricular goals in reading, math, writing, and special education.	27–45	Met
Section I, D	Academic criterion #2: Year-to-year achievement measure for 1st through 12th grades. a. 2nd- and 3rd-grade students at or above grade-level equivalent (GLE) in reading: At least 75.0% maintain GLE. b. 4th- through 8th-grade students proficient or advanced in reading: At least 75.0% maintain proficiency level. c. 4th- through 8th-grade students proficient or advanced in math: At least 75.0% maintain proficiency level.	 a. N/A b. 71–72 c. 71–72	 a. N/A b. Met. When former WKCE cut scores were applied, 86.7% of 195. c. Met. When former WKCE cut scores were applied, 91.3% of 173.

[71] All ninth graders completed the EXPLORE. Of 48 tenth graders, 46 completed the PLAN; one of the two that did not take it withdrew two days after the test. Of 39 eleventh graders, 38 completed the ACT by June 2014; one student registered twice but did not complete the test. Of 21 twelfth graders, 20 completed the ACT, but not all 20 took it in the fall; the student who did take the ACT signed up three times but never completed it.

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Milwaukee Academy of Science Overview of Compliance for Education-Related Contract Provisions 2013–14			
Section of Contract	**Education-Related Contract Provision**	**Report Reference Page(s)**	**Contract Provision Met or Not Met**
	d. 10th-grade students at or above benchmarks on the EXPLORE: At least 75.0% will maintain benchmarks on the PLAN.	d. 78	d. Not met[72]
	e. 11th-grade students at or above benchmarks on the PLAN: At least 75.0% will maintain benchmarks on the ACT.	e. 80	e. Not met[73]
Section I, D	Academic criterion #3: Year-to-year achievement measure for 1st through 12th grades.		
	a. 2nd- and 3rd-grade students below grade level in reading: Advance more than 1 GLE in reading.	a. N/A	a. N/A
	b. 4th- through 8th-grade students below proficient level in reading: At least 60% will advance one level of proficiency or to the next quartile within the proficiency-level range.	b. 73	b. Not met. When former cut scores were applied, 39.7% of 73.
	c. 4th- through 8th-grade students below proficient level in math: At least 60.0% will advance one level of proficiency or to the next quartile within the proficiency-level range.	c. 74	c. Not met. When former cut scores were applied, 44.2% of 95.
	d. 10th-grade students below benchmarks on the EXPLORE: At least 60.0% of students below benchmark on any EXPLORE subtest or the composite score will reach benchmark or gain at least one point on the same	d. 79	d. Met[74]

[72] There were too few students at or above the math, reading, science, and composite EXPLORE benchmarks to include results in this report; only 66.7% of students at or above the English benchmark maintained benchmark status on the PLAN.

[73] Only 41.2% of students at or above the PLAN English benchmark maintained benchmark on the ACT. There were too few students at or above the math, reading, science, and composite benchmarks to include results in this report.

[74] More than 60.0% of students progressed on all four subtests and the composite score.

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Milwaukee Academy of Science Overview of Compliance for Education-Related Contract Provisions 2013–14			
Section of Contract	**Education-Related Contract Provision**	**Report Reference Page(s)**	**Contract Provision Met or Not Met**
	subtest or composite score on the PLAN. e. 11th-grade students below benchmarks on the PLAN: At least 60.0% of students below benchmark on any PLAN subtest or the composite score will reach benchmark or gain at least one point on the same subtest or composite score on the ACT.	e. 81	e. Partially met[75]
Section I, E	Parental involvement.	13–14	Met
Section I, F	Instructional staff hold a DPI license or permit to teach.	10	Not met[76]
Section I, I	Pupil database information, including special education-needs students.	18–21	Met
Section I, K	Discipline procedures.	14–16	Met

[75] More than 60% of students progress on the English, math, and reading subtests from the fall to spring; 59.6% of students showed progress on the composite score. Only 46.1% of students progressed on the science subtest.

[76] A math teacher in the high school and a science, technology, engineering, and mathematics teacher did not have a DPI license. Both teachers had applied to DPI for licensed but the applications did not include all the necessary materials, so licenses were not granted before the end of this school year.

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Appendix B

Outcome Measures Agreement Memos

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Student Learning Memorandum for Milwaukee Academy of Science Primary/Elementary Academy

To: Children's Research Center and the Charter School Review Committee
From: Milwaukee Academy of Science Primary/Elementary Academy
Re: Learning Memo for the 2013–14 School Year
Date: October 3, 2013

The following procedures and outcomes will be used for the 2013–14 school year to monitor the education-related activities described in the Milwaukee Academy of Sciences (MAS) Primary/Elementary Academy's charter school contract with the City of Milwaukee. Data will be provided to the Children's Research Center (CRC), the monitoring agent contracted by the City of Milwaukee Charter School Review Committee (CSRC). Data will be reported in a spreadsheet or database that includes each student's state ID number(s). CRC requests electronic submission of year-end data on the fifth day following the last day of student attendance for the academic year, or June 20, 2014. Additionally, paper test printouts or data directly from the test publisher must be provided to CRC for all standardized tests.

The school will record student data in the PowerSchool (PS) database and Excel spreadsheets. The school will be able to generate a student roster in a usable data file format that lists all students enrolled at any time during the school year. The roster will include student name, student ID number, Wisconsin Student Number (WSN), enrollment date, withdrawal date and reason, grade, gender, race/ethnicity, free/reduced lunch eligibility, special education status, and, if applicable, disability type.

Attendance
The school will maintain an average daily attendance rate of 91.0%. Attendance rates will be reported as present, excused absence, unexcused absence, and out-of-school suspension. A student is marked partial day (excused or unexcused) if he/she arrives after 11:00 a.m. or leaves before 3:20 p.m.

Enrollment
The school will record the enrollment date for every student. Upon admission, individual student information will be added to the school database, including student name, student ID number, WSN, enrollment date, grade, gender, race/ethnicity, free/reduced lunch eligibility, special education status, and, if applicable, disability type.

Termination/Withdrawal
The withdrawal date and reason, including expulsion, for every student leaving the school will be recorded in the school database.

Parent Participation
At least 80.0% of students enrolled for the entire school year will have their parent(s) participate in two of the three scheduled parent-teacher conferences. If a parent(s) does not attend a scheduled conference at the school, MAS will conduct the conference with the parent either via phone or home visit. The date of the conference, the type of contact (school, phone, or home), and whether a parent/guardian or other interested person participated in the conference will be recorded by the school for each student.

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Special Education Needs Students
The school will maintain updated records on all evaluated students and eligible special education students, including date of the most recent individualized education program (IEP) team eligibility evaluation; evaluation results (eligible or ineligible) and disability type; IEP completion date; parent participation in IEP; number of IEP goals; IEP annual review dates; number of IEP goals achieved at the annual review; and planned date for the next evaluation/eligibility assessment.

Academic Achievement: Local Measures

Literacy and Math
At least 85.0% of the students in K4 and K5 who completed the fall and spring PALS-K will achieve the summed score spring benchmark. The summed score benchmark[77] is a total of the scores for rhyme awareness, beginning sound awareness, alphabet recognition, letter sounds, spelling, and concept of word's word list.

At least 80.0% of K4 and K5 students who complete the fall and spring math skill assessments will have acquired at least 80.0% of the math competencies designated as benchmarks for their grade level on the spring assessment. These assessments were designed by the MAS staff based on their SRA Real Math curriculum and are aligned to the common core state standards.[78]

First- through fifth-grade students will complete Measures of Academic Progress (MAP) reading and math tests in the fall and spring of the school year. At the time of the fall test, each student's reading score will be compared to national grade level averages based on the 2011 Northwest Evaluation Association (NWEA) normative study. For the cohort of students who complete the fall and spring tests, CRC will report progress for students above the normative mean for their grade level and students at or below the national average for their current grade level. Based on fall test scores and the student's current grade level, the student receives a target growth RIT score for the spring test.

- Progress for students above the normative mean for their current grade at the time of the fall test will be measured by examining the change in RIT scores from fall to spring. For first and second graders, an increase of six or more RIT points will indicate progress for the current school year; for third through fifth graders, an increase of four or more points will indicate progress.

- For students at or below their normative grade level average, progress will be determined by examining whether the student met the MAP growth target based on their fall test score and current grade level; students who met their growth target for the year will be considered to have made adequate progress for the school year.

At least 70.0% of all students who complete both the fall and spring assessments will show progress this year.

[77] The PALS-K summed score spring benchmark is 81.

[78] The National Council of Teachers of Mathematics (NCTM) describes the curriculum focal points that identify the most important math standards at a particular level. SRA's Real Math was developed to build key math concepts in line with the NCTM focal points. More information available online at: https://www.mheonline.com/program/view/1/16/248/0076053903/

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Writing

By the end of the final marking period, students in third through fifth grades will have a writing sample assessed. Each grade cohort will be judged to have at least "adequate control," as indicated by an average total score of 12. At least 75.0% of the students will achieve a score of 12 or above. Writing skills appropriate for each grade level will be assessed in the following six domains: purpose and focus, organization and coherence, development of content, sentence fluency, word choice, and grammar. Each domain will be assessed on the following scale: 1 = minimal/basic control; 2 = adequate control; and 3 = proficient/advanced control.

Special Education Students

At least 80.0% of the special education students will meet one or more of the goals defined in their IEP, as assessed by the participants in their most recent annual review. Data on each special education student's goal achievements will be recorded in an Excel spreadsheet by student ID number.

Academic Achievement: Standardized Measures

The following standardized test measures will assess academic achievement in reading and/or mathematics.

K4 through second grade: The Phonological Awareness Literacy Screening (PALS) will be administered to all students in K4 through first grade in the fall and spring of each year within the timeframes required by the Wisconsin Department of Public Instruction (DPI).[79] Second-grade students will complete the PALS in the spring of the school year. PALS provides information about each student's level of mastery of early literacy fundamentals at different times during the school year.[80]

> Because this is the first year that schools are required to administer the PALS to first- and second grade students, the CSRC has not yet set any specific academic expectations for students taking the PALS. Pending expectations by the CSCR, CRC plans to complete the following analysis for this assessment series:[81]
>
> - Benchmark achievement levels for students on both the fall and spring assessments (spring only for second graders);
> - For K4, K5, and first-grade students, student cohort progress from fall to spring on each grade level assessment (not applicable for second graders); and

[79] The school must administer the PALS in the fall and spring of the school year for K4 through first graders; if DPI requires additional test administrations, CRC will request data from the additional test administrations as well.

[80] PALS was developed by researchers at the University of Virginia and is considered a scientifically based reading assessment for kindergarten students. It assesses key literacy fundamentals, including phonic awareness, fluency, and vocabulary. Specifically, PALS assesses rhyme awareness, beginning sound awareness, alphabet knowledge, letter sounds, spelling, concept of word, and word recognition in isolation (optional). (Note: This information was taken from the DPI website, http://www.palswisconsin.info.)

[81] If the CSRC sets specific expectations or requests different analyses during the school year, CRC will replace these current plans with the plans and expectations formulated and adopted by the CSRC.

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- If applicable, year–to-year progress for students who completed the PALS-K in 2012–13 and also completed the PALS-1 in 2013–14.[82]

Third through fifth grades: The Wisconsin Knowledge and Concepts Examination (WKCE) will be administered on an annual basis in the timeframe identified by the DPI. The WKCE reading subtest will provide each student with a proficiency level via a scale score in reading, and the WKCE math subtest will provide each student with a proficiency level via a scale score in math. For fourth graders, it will also include language arts, science, and social studies scale scores. Results will also reflect each student's statewide percentile score. In 2012–13, the WKCE cut scores for reading and math were revised based on cut scores for the National Assessment of Educational Progress (NAEP). As in the 2012–13 school year, CRC will analyze the data using both the revised cut scores and the former cut scores that were used through the 2011–12 school year. The standards below apply only to results based on the former cut scores, pending a different decision by the CSRC.

- At least 75.0% of the students who were proficient or advanced in reading and/or math on the WKCE in 2012–13 will maintain their status of proficient or above in the subsequent year.

- More than 60.0% of the students who tested below proficient (basic or minimal) in reading and/or mathematics on the WKCE in 2012–13 will improve a proficiency level or at least one quartile within their proficiency level in the next school year. This is a school-wide expectation.

[82] At the time of this memo, CRC was researching whether examining year-to-year reading progress using PALS was possible. If year-to-year progress can be measured, CRC will include those results in the report.

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Student Learning Memo Data Addendum
Milwaukee Academy of Science

This addendum has been developed to clarify the data collection and submission process related to each of the outcomes stated in the school's student learning memo for the 2013–14 academic year. Additionally, important principles applicable to all data collection must be considered.

1. All students attending the school *at any time during the 2013–14 academic year* should be included in all student data files created by the school. This includes students who enroll after the first day of school and students who withdraw before the end of the school year. Be sure to include each student's ID number in each data file.

2. All data fields must be completed for each student *enrolled at any time during the school year*. If a student is not enrolled when a measure is completed, record N/E for that student to indicate "not enrolled." This may occur if a student enrolls after the beginning of the school year or withdraws prior to the end of the school year.

3. Record and submit a score/response for each student. *Please do not submit aggregate data* (e.g., 14 students scored 75.0%, or the attendance rate was 92.0%).

End-of-the-year data must be submitted to CRC no later than the fifth working day after the end of the second semester, or June 20, 2014.

Staff persons responsible for year-end data submission: Jaqueline DeJean (JD)
Tangella King (TK)
Tresca Meiling (TM)

Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
Student Roster, Enrollment, and Termination	For each student enrolled at any time during the year, include the following: • Wisconsin student number (WSN) • Local student ID • Student name • Grade • Whether student is repeating a grade • Gender • Race/ethnicity • Free/reduced lunch status (free, reduced, not eligible) • Enrollment date • Termination/withdrawal date, if applicable • Termination/withdrawal reason, if applicable, including if student was expelled	PowerSchool Note that enrollment and termination data for primary school students can be combined with the same data for junior academy and high school students and sent to CRC in one spreadsheet.	Dena McCormick (DM)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	• Assessed for special education (Y, eligible; Y, not eligible; N, not eligible)		
Attendance	For each student enrolled at any time during the year, include the following: • WSN • Student name • Number of days expected attendance • Number of days attended • Number of days excused absence • Number of days unexcused absence • Number of days in in-school suspension • Number of days in out-of-school suspension	Export data from PowerSchool into a usable data format such as a spreadsheet. Note that attendance data for primary school students can be combined with the same data for junior academy and high school students and sent to CRC in one spreadsheet.	DM
Parent Participation	For each student enrolled at any time during the year, include the following: • WSN • Student name • Parent participation in conference 1 (Y, N, N/A) • Conference 1 type (school, phone, home, N/A) • Parent participation in conference 2 (Y, N, N/A) • Conference 2 type (school, phone, home, N/A) • Parent participation in conference 3 (Y, N, N/A) • Conference 3 type (school, phone, home, N/A)	Student data in a spreadsheet Provide conference dates via a document or email.	JD
Special Education Needs Students	For each student assessed for special education needs (as indicated on the student roster), include the following: • WSN • Student name • Special education need, e.g., ED, CD, LD, OHI, etc. » Was student enrolled in special education services at MAS during the previous school year (i.e., was student continuing special education or did special education services begin this year)?	Spreadsheet	Celia Kuhl (CK)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	» Eligibility assessment date (date the team met to determine eligibility; may be during previous school year) » Eligibility re-evaluation date (three-year re-evaluation date to determine if the child is still eligible for special education; may be during a subsequent school year) » IEP completion date (date the IEP in place during this school year was developed; may have been during a prior year; if initial, the date will be this school year) » IEP review date (date the IEP was reviewed this year; if the initial IEP was developed this year, enter N/A) » IEP review results, e.g., continue in special education, no longer eligible for special education, or N/A » # goals on IEP in place this year OR on the initial IEP if this is the first year » # goals met on IEP at the time of the annual review. Enter N/A if the IEP was new and was not reviewed this year		
Academic Achievement: Local Measures *K4 and K5 Literacy*	For each student, include the following: • WSN • Student name • Grade • Fall 2013 PALS summed score • Spring 2014 PALS summed score	Spreadsheet	TM
Academic Achievement: Local Measures *K4 and K5 Math*	For each student, include the following: • WSN • Student name • Grade • Percent of competencies achieved on the fall 2013 math	Spreadsheet	TM

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	skill assessment • Percent of competencies achieved on the spring 2014 math skill assessment		
1st- Through 5th-Grade Literacy	For each 1st- through 5th-grade student, include the following: • WSN • Student name • Grade • Fall 2013 MAP reading RIT score • MAP reading growth target score • Spring 2014 MAP reading RIT score • Met MAP reading target (Y/N)	Spreadsheet	TK and TM
1st- Through 5th-Grade Math	For each 1st- through 5th-grade student, include the following: • WSN • Student name • Grade • Fall 2013 MAP math RIT score • MAP math growth target score • Spring 2014 MAP math RIT score • Met MAP math target (Y/N)	Spreadsheet	TK and TM
3rd- Through 5th-Grade Writing	For each student, include the following: • WSN • Student name • Grade • Total, end-of-year writing score	Spreadsheet	TK
Academic Achievement: Standardized Measures *PALS K4 and K5*	PALS data for grades K4 and K5 are described above in the local measures section.		TM
Academic Achievement: Standardized Measures *PALS* *1st and 2nd Grade*	For each student, include the following: • WSN • Student name • Grade <u>FALL (1st graders only)</u> • Fall entry level summed score • If applicable, fall Level B summed score • If applicable, fall Level C blending and sound-to-letter scores <u>SPRING (1st and 2nd graders)</u>	Spreadsheet; provide paper copies of the test publisher's printout	TM

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	• Spring entry level summed score • If applicable, spring Level B summed score • If applicable, spring Level C blending and sound-to-letter scores		
Academic Achievement: Standardized Measures *WKCE* *3rd Through 5th Grade*	For each student, include the following: • WSN • Student name • Proficiency level, scale score, and statewide percentile for WKCE math test • Proficiency level, scale score, and statewide percentile for WKCE reading test For students in 4th grade, also include: • Proficiency level and scale score for WKCE language arts test • Proficiency level and scale score for WKCE social studies test • Proficiency level and scale score for WKCE science test • Writing composite score	Spreadsheet; provide paper copies of the test publisher's printout	TK

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Student Learning Memorandum for Milwaukee Academy of Science Junior Academy

To: Children's Research Center and Charter School Review Committee
From: Milwaukee Academy of Science Junior Academy
Re: Learning Memo for the 2013–14 Academic Year
Date: September 16, 2013

Note: This memorandum of understanding includes the *minimum* measurable outcomes required by the City of Milwaukee Charter School Review Committee (CSRC). It also describes outcomes defined by the school to monitor and report students' academic progress. These outcomes have been defined by the leadership and/or staff at the school in consultation with staff from the Children's Research Center (CRC) and the CSRC. Data will be provided to CRC, the monitoring agent contracted by the CSRC. Data will be reported in a spreadsheet or database that includes each student's Wisconsin Student Number (WSN). CRC requests electronic submission of year-end data on the fifth day following the last day of student attendance for the academic year, or June 20, 2014. Additionally, paper test printouts or data directly from the test publisher will be provided to CRC for all standardized tests.

The school will record student data in the PowerSchool (PS) database and/or Excel spreadsheets. The school will be able to generate a student roster in a usable data file format that lists all students enrolled at any time during the school year. The roster will include student name, local student ID number, WSN, enrollment date, withdrawal date and reason, grade, gender, race/ethnicity, free/reduced lunch eligibility, special education status, and, if applicable, disability type.

Enrollment
The school will record enrollment dates for every student. Upon admission, individual student information and actual enrollment date will be added to the school's PS database.

Termination/Withdrawal
The date and reason for every student leaving the school will be determined, and an exit date will be recorded in the school's PS database. Information will include the date of withdrawal/termination and the reason for the student leaving the school, such as expelled, dropped out, moved, transportation issues, dissatisfaction with the school, etc. Reasons for each expulsion will also be recorded.

Attendance
The school will maintain appropriate attendance records. These records need to include student data on excused absences, unexcused absences, and out-of-school suspensions. Attendance data will include WSN for each student. The junior academy will achieve an attendance rate of at least 91.0%; students will be marked present for the day if they arrive at school prior to 10:00 a.m.

Parent/Guardian Participation
Parents of at least 80.0% of students enrolled for the entire school year will participate in two out of the three scheduled parent-teacher conferences held for the junior academy students. Note that a parent conference with any teacher during each of the three conference periods will be counted as

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participation and should be reported by student and conference period (fall, winter, or spring). The WSN; student name; date of each conference; conference participants (student and/or parent); and whether the conference was held at the school, via phone, or at the student's home will be recorded in a database or spreadsheet.

Special Education Needs Students

The school will maintain updated records on all students evaluated and eligible for special education services, including date of the most recent individualized education program (IEP) team eligibility evaluation; evaluation results, including if the student was ineligible; and if eligible, the disability type, IEP completion date, parent participation in IEP, number of IEP goals, IEP annual review dates, number of IEP goals achieved at the annual review, and planned date for the next evaluation/eligibility assessment. Note: Specific instructions for each data element are further described in the data addendum.

Academic Achievement: Local Measures[83]

Literacy

Junior academy students will complete Measures of Academic Progress (MAP) reading tests in the fall and spring of the school year. At the time of the fall test, each student's reading score will be compared to national grade level averages based on the 2011 Northwest Evaluation Association (NWEA) normative study. For the cohort of students who complete the fall and spring tests, CRC will report progress for students above the normative mean for their grade level and students at or below the national average for their current grade level. Based on fall test scores and the student's current grade level, the student receives a target growth RIT score for the spring test.

- Progress for students above the normative mean for their current grade at the time of the fall test will be measured by examining the change in RIT scores from fall to spring; an increase of one RIT point will indicate progress for the current school year.

- For students at or below their normative grade level average, progress will be determined by examining whether the student met the MAP growth target based on their fall test score and current grade level; students who met their growth target for the year will be considered to have made adequate progress for the school year.

At least 70.0% of all students who complete both the fall and spring assessments will show progress this year.

Mathematics

Junior academy students will complete MAP math tests in the fall and spring of the school year. At the time of the fall test, each student's math score will be compared to national grade level averages based on the 2011 NWEA normative study. For the cohort of students who complete the fall and

[83] Local measures of academic achievement are classroom- or school-level measures that monitor student progress throughout the year (formative assessment) and can be summarized at the end of the year (summative assessment) to demonstrate academic growth. They are reflective of each school's unique philosophy and curriculum. The CSRC requires local measures of academic achievement in the areas of literacy, mathematics, writing, and IEP goals.

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spring tests, CRC will report progress for students above the normative mean for their grade level and students at or below the national average for their current grade level.

Based on fall test scores and the student's current grade level, the student receives a target growth RIT score for the spring test.

- Progress for students above the normative mean for their current grade at the time of the fall test will be measured by examining the change in RIT scores from fall to spring; an increase of one RIT point will indicate progress for the current school year.

- For students at or below their normative grade level average, progress will be determined by examining whether the student met the MAP growth target based on their fall test score and current grade level; students who met their growth target for the year will be considered to have made adequate progress for the school year.

At least 70.0% of all students who complete both the fall and spring assessments will show progress this year.

Writing

By the end of the final marking period, students in sixth through eighth grades will have writing samples assessed, and each grade cohort will be judged to have, on average, at least "adequate control," as indicated by an average total score of 18 or higher. Student writing skills will be assessed in the following six domains based on grade level or IEP expectations: purpose and focus, organization and coherence, development of content, sentence fluency, word choice, and grammar. Each domain will be assessed on the following scale: 1 = minimal control; 2 = basic control; 3 = adequate control; 4 = proficient control; and 5 = advanced control.

IEP Goals

At least 80.0% of the special education students will meet one or more of the goals defined in their IEPs. Data on each special education student's goal achievements will be recorded in an Excel spreadsheet by student WSN.

Academic Achievement: Standardized Measures

Sixth-, Seventh-, and Eighth-Grade Students

The Wisconsin Knowledge and Concepts Examination (WKCE) will be administered on an annual basis in the timeframe identified by the Wisconsin Department of Public Instruction. The WKCE reading subtest will provide each student with a proficiency level via a scale score in reading, and the WKCE math subtest will provide each student with a proficiency level via a scale score in math. For eighth graders, it will also include language arts, science, and social studies scale scores. Results will also reflect each student's statewide percentile score. In 2012–13, the WKCE cut scores for reading and math were revised based on cut scores for the National Assessment of Educational Progress (NAEP). As in the 2012–13 school year, CRC will analyze the data using both the revised cut scores and the former cut scores that were used through the 2011–12 school year. The standards below apply only to results based on the former cut scores, pending a different decision by the CSRC.

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- At least 75.0% of the students who were proficient or advanced in reading and/or math on the WKCE in 2012–13 will maintain their status of proficient or above in the subsequent year.

- More than 60.0% of the students who tested below proficient (basic or minimal) in reading and/or mathematics on the WKCE in 2012–13 will improve a proficiency level or at least one quartile within their proficiency level in the next school year. This is a school-wide expectation.

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Learning Memo Data Addendum
Milwaukee Academy of Science

This addendum has been developed to clarify the data collection and submission process related to each of the outcomes stated in the school's learning memo for the 2013–14 academic year. Additionally, important principles applicable to all data collection must be considered.

1. All students attending the school at any time during the 2013–14 academic year should be included in all student data files created by the school. This includes students who enroll after the first day of school and students who withdraw before the end of the school year. Be sure to include each student's unique WSN in each data file.

2. All data fields must be completed for each student enrolled at any time during the school year. If a student is not enrolled and/or present when a measure is completed, record an N/E for that student to indicate "not enrolled." This may occur if a student enrolls after the beginning of the school year or withdraws prior to the end of the school year.

3. Record and submit a score/response for each student. Please do not submit aggregate data (e.g., 14 students scored 75.0%, or the attendance rate was 92.0%).

End-of-the-year data must be submitted to CRC by no later than the fifth working day after the end of the second semester, or June 20, 2014.

Staff person(s) responsible for year-end data submission: Lyndee Belanger (LB)

Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
Student Roster; Enrollment and Termination	For each student enrolled at any time during the year, include the following: • Wisconsin student number (WSN) • Local student ID • Student name • Grade • Gender • Race/ethnicity • Free/reduced lunch status (free, reduced, not eligible) • Enrollment date • Termination/withdrawal date, if applicable • Termination/withdrawal reason, if applicable, including if the student was expelled • Assessed for special education (Y, eligible; Y, not eligible; N/A)	PowerSchool Note that enrollment and termination data for junior academy students can be combined with the same data for elementary school students and sent to CRC in one spreadsheet.	Dena McCormick (DM)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
Attendance	For each student enrolled at any time during the year, include the following: • WSN • Student name • Number of days expected attendance • Number of days attended • Number of days excused absence • Number of days unexcused absence • Number of times out-of-school suspension • Number of days out-of-school suspension	PowerSchool Note that attendance data for junior academy students can be combined with the same data for elementary school students and sent to CRC in one spreadsheet.	DM
Parent Participation	For each student enrolled at any time during the year, include the following: • WSN • Student name • Conference 1 date • Attend conference 1 (parent, student, parent and student, none, N/A) • Conference 1 type (school, phone, home, none, N/A) • Conference 2 date • Attend conference 2 (parent, student, parent and student, none, N/A) • Conference 2 type (school, phone, home, none, N/A) • Conference 3 date • Attend conference 3 (parent, student, parent and student, none, N/A) • Conference 3 type (school, phone, home, none, N/A) Note: Conference data should be reported in aggregate for each conference period (i.e., fall, winter, and spring). If a student's parent attends a conference with ANY teacher on the scheduled conference dates, either in person at the school or the student's home or over the phone, that parent will be	Spreadsheet designed by school	Kristi Bachar (KB)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	considered in attendance for the conference period. Indicate attendance for each conference period in the columns outlined above.		
Special Education Needs Students	For each student assessed for special education needs (as indicated on the student roster), include the following: • WSN • Student name • Special education need, e.g., ED, CD, LD, OHI, etc. • Was student enrolled in special education services at MAS during the previous school year (i.e., was student continuing special education or did special education services begin this year)? • Eligibility assessment date (date the team met to determine eligibility; may be during previous school year) • Eligibility re-evaluation date (three-year re-evaluation date to determine if child is still eligible for special education; may be during a subsequent school year) • IEP completion date (date the IEP in place during this school year was developed; may have been during a prior year; if initial, the date will be this school year) • IEP review date (date the IEP was reviewed this year; if the initial IEP was developed this year, enter N/A) • IEP review results, e.g., continue in special education, no longer eligible for special education, or N/A • # goals on IEP in place this year OR on the initial IEP if this is the first year; • # goals met on IEP at the time of the annual review. Enter N/A if	Spreadsheet designed by school	Celia Kuhl (CK)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	the IEP was new and was not reviewed this year.		
Academic Achievement: Local Measures Literacy	For 6th-, 7th-, and 8th-grade students, also include the following: • Fall MAP reading RIT score • MAP reading growth target • Spring MAP reading RIT score • Student met MAP reading growth target (Y/N)	Spreadsheet designed by school	LB
Academic Achievement: Local Measures Math	For 6th-, 7th-, and 8th-grade students, include the following: • Fall MAP math RIT score • MAP math growth target • Spring MAP math RIT score • Student met MAP math growth target (Y/N)	Spreadsheet designed by school	LB
Academic Achievement: Local Measures Writing	For each student, enter the following: • WSN • Student name • Final total writing score	Spreadsheet designed by school	LB
Academic Achievement: Local Measures IEP	See "Special Education Needs Students" section above.	Spreadsheet designed by school	CK
Academic Achievement: Standardized Measures WKCE	For each 6th-, 7th-, and 8th-grade student, include the following: • WSN • Student name • Proficiency level, scale score, and state percentile for WKCE math test • Proficiency level, scale score, and state percentile for WKCE reading test For 8th-grade students, also include the following: • Proficiency level and scale score for WKCE language arts test • Proficiency level and scale score for WKCE social studies test • Proficiency level and scale score for WKCE science test • Total writing score	Export results from the Turnleaf website to a spreadsheet. Also provide paper copies of all students' WKCE scores.	LB

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Student Learning Memorandum for Milwaukee Academy of Science High School

To: Children's Research Center and Charter School Review Committee
From: Milwaukee Academy of Science High School
Re: Learning Memo for the 2013–14 Academic Year
Date: September 16, 2013

Note: This memorandum of understanding includes the *minimum* measurable outcomes required by the City of Milwaukee Charter School Review Committee (CSRC). It also describes outcomes defined by the school to monitor and report students' academic progress. These outcomes have been defined by the leadership and/or staff at the school in consultation with staff from the Children's Research Center (CRC) and the CSRC. Data will be provided to CRC, the monitoring agent contracted by the CSRC. Data will be reported in a spreadsheet or database that includes each student's Wisconsin Student Number (WSN). CRC requests electronic submission of year-end data on the fifth day following the last day of student attendance for the academic year, or June 20, 2014. Additionally, paper test printouts or data directly from the test publisher will be provided to CRC for all standardized tests.

The Milwaukee Academy of Science (MAS) will record student data in the PowerSchool (PS) database and/or Excel spreadsheets. The school will be able to generate a student roster in a usable data file format that lists all students enrolled at any time during the school year. The roster will include student name, local student ID number, WSN, enrollment date, withdrawal date and reason, grade, gender, race/ethnicity, free/reduced lunch eligibility, special education status, and, if applicable, disability type.

Enrollment
The school will record enrollment dates for every student. Upon admission, individual student information and actual enrollment date will be added to the school's PS database.

Termination/Withdrawal
The date and reason for every student leaving the school will be determined, and an exit date will be recorded in the school's PS database. Information will include the date of withdrawal/termination and the reason for the student leaving the school, such as expelled, dropped out, moved, transportation issues, dissatisfaction with the school, etc. Reasons for each expulsion will also be recorded.

Attendance
The school will maintain appropriate attendance records. These records need to include student data on excused absences, unexcused absences, and out-of-school suspensions. Attendance data will include WSN for each student. MAS will achieve an attendance rate of at least 91.0%. High school students who miss any portion of the school day are considered truant.[84]

[84] Excused and unexcused absences, as well as suspension data for high school students, is reported by class period; CRC will use these data to calculate the number of days each student missed due to excused absences, unexcused absences, or in- or out-of-school suspension. The number of days enrolled, the number of days attended, and overall absences should be reported as days.

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Parent/Guardian Participation
Parents of at least 80.0% of students enrolled for the entire school year will participate in two out of the three scheduled parent-teacher conferences. Note that a parent conference with any teacher during each of the three conference periods will be counted as participation and should be reported by student and conference period (fall, winter, or spring). The WSN; student name; date of each conference; conference participants (student and/or parent); and whether the conference was held at the school, via phone, or at the student's home will be recorded in a database or spreadsheet.

Special Education Needs Students
The school will maintain updated records on all students evaluated and eligible for special education services, including date of the most recent individualized education program (IEP) team eligibility evaluation; evaluation results, including if the student was ineligible; and if eligible, the disability type, IEP completion date, parent participation in IEP, number of IEP goals, IEP annual review dates, number of IEP goals achieved at the annual review, and planned date for the next evaluation/eligibility assessment. Note: Specific instructions for each data element are further described in the data addendum.

High School Graduation Plan
Each student (ninth through twelfth grades) will develop a high school graduation plan by the end of his/her first semester of enrollment at the school. Each student will incorporate the following into his/her high school graduation plan.

- Information regarding the student's post-secondary plans.
- A schedule reflecting plans for completing four credits each in English and mathematics; five credits in science; three credits in social studies; and two credits each in foreign language, physical education/health, and other electives.[85]
- Evidence of parent/guardian/family involvement. Involvement means that during the first scheduled parent-teacher conference, teachers/staff will review each student's graduation plan with his/her parent(s) whether the conference is held at the school, via phone, or via home visit. If a parent does not participate in this conference, MAS will have a conference with the student and submit a written report to the parent via regular mail.

The guidance counselor/advisor will meet with each eleventh- and twelfth-grade student during the first quarter to discuss the student's graduation plan.

For ninth through twelfth grades, student schedules will be reviewed by the guidance counselor/advisor by the end of the school year to determine if each student is on track toward earning credits and whether or not the student will need to enroll in summer school.

[85] Credit requirements were revised and will be applied to students in the class of 2017 or after; for those students, the schedule must reflect the number of credits required to graduate based on these revised graduation requirements.

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High School Graduation Requirements[86]

- All ninth graders who earn at least 6.0 credits will be promoted to tenth grade.[87]
- All tenth graders who earn at least 11.0 credits will be promoted to eleventh grade.
- All eleventh graders who earn at least 16.5 credits will be promoted to twelfth grade.
- All twelfth graders who earn at least 22.0 credits, including the required courses, will graduate.

Academic Achievement: Local Measures[88]

Literacy

Ninth graders will complete all of the subtests on the EXPLORE, and tenth graders will complete all of the subtests on the PLAN in the fall and spring of the 2013–14 school year. Progress will be measured from the fall to spring English and reading subtests. At least 70.0% of the students who complete both the fall and spring assessments will reach the benchmark or increase their scores by at least one point by the spring test. Ninth and tenth graders who enroll after the fall testing dates will be tested within 30 days of enrollment using the EXPLORE or PLAN.

Reading progress for eleventh and twelfth graders will be demonstrated by changes in their Lexile level scores[89] as measured by the Scholastic Reading Inventory (SRI) administered by the end of September and again at the end of the school year.[90] Students will increase their Lexile level scores, on

[86] This item depends on the school's high school graduation requirements and the timing of the student's coursework. Outcomes reflect what would be needed at each grade level to meet graduation requirements by the end of the fourth year. Some special education students' IEPs indicate that they will need more than four years of study to graduate. However, these students are promoted for this school year from ninth to tenth grade with 4.5 credits, tenth to eleventh grade with nine credits, and eleventh to twelfth grade with 13.5 credits. All special education students are required to accumulate 22 credits to graduate from MAS.

[87] MAS has adopted new graduation requirements effective for the class of 2017. The following credits are necessary for promotion to the next grade level: sophomore six, junior, 12; senior, 18; and graduate, 24.

[88] Local measures of academic achievement are classroom- or school-level measures that monitor student progress throughout the year (formative assessment) and can be summarized at the end of the year (summative assessment) to demonstrate academic growth. They are reflective of each school's unique philosophy and curriculum. The CSRC requires local measures of academic achievement in the areas of literacy, mathematics, writing, and IEP goals.

[89] The Lexile Framework is a research-proven system for measuring students' reading levels and matching readers to text. The Lexile Framework is unique because it uses a common metric—a Lexile measure—to evaluate both reading ability and text difficulty. By placing both reader and text on the same scale, the Lexile Framework allows educators to forecast the level of comprehension a student will experience with a particular text and evaluate curriculum needs based on each student's ability to comprehend the materials.

[90] This test will be given regularly to all new students as per the requirement (#1) of the CSRC expectations policy dated February 1, 2008, for its high schools.

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average, at least 13 points from fall to spring.[91] Any eleventh or twelfth grader who enrolls after the September testing date will be tested within 30 calendar days of enrollment using the SRI.

Mathematics

Ninth graders will complete all of the subtests on the EXPLORE, and tenth graders will complete all of the subtests on the PLAN in the fall and spring of the 2013–14 school year. Progress will be measured from the fall to spring math subtest. At least 55.0% of the students who complete both the fall and spring assessments will reach the benchmarks or increase their scores by at least one point by the spring test. Ninth and tenth graders who enroll after the fall testing dates will be tested within 30 days of enrollment using the EXPLORE or PLAN.

Math progress for eleventh and twelfth graders enrolled in a math course during the school year will be measured by the comprehensive tests for the math course in which they are enrolled.[92] The end-of-year test results will be reported to CRC. At least 65.0% of the students will attain scores of at least 70.0% on their comprehensive course exams at the end of the school year. In addition, all new eleventh and twelfth graders will be given the Wide Range Achievement Test (WRAT) within 30 days of their enrollment to assess their basic math competency levels.[93]

Writing

By the end of the final marking period, students in ninth through twelfth grades will have writing samples assessed. Each grade cohort will be judged to have, on average, at least "adequate control," as indicated by an average total score of 18 or higher. Student writing skills will be assessed in the following six domains based on grade level or IEP expectations: purpose and focus, organization and coherence, development of content, sentence fluency, word choice, and grammar. Each domain will be assessed on the following scale: 1 = minimal control; 2 = basic control; 3 = adequate control; 4 = proficient control; and 5 = advanced control.

IEP Goals

At least 80.0% of the special education students will meet one or more of the goals defined in their IEPs. Data on each special education student's goal achievements will be recorded in an Excel spreadsheet by student WSN.

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[91] These Lexile score increases would indicate that students in these respective grade levels had made one year of progress in the acquisition of comprehension and vocabulary skills.

[92] The math courses offered to high school students include algebra, geometry, advanced algebra, advanced algebra/trigonometry, pre-calculus, and statistics. Not all eleventh- and twelfth-grade students are enrolled in a math class. Some students have already completed the requirement to earn four credits in math prior to graduation; students not enrolled in a math class during the school year will not be tested.

[93] This test will be given regularly to all new students as per the requirement (#1) of the CSRC expectations policy dated February 1, 2008, for its high schools.

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Academic Achievement: Standardized Measures

Ninth-Grade Students
All ninth-grade students are required to take all subtests[94] of the EXPLORE test (the first in a series of two pre-ACT tests that will identify students who are not ready for the ACT)[95] in the fall of the school year. The EXPLORE will be administered again in the spring.

Tenth-Grade Students
All tenth-grade students are required to take the Wisconsin Knowledge and Concepts Examination (WKCE) in the timeframe identified by the Department of Public Instruction (DPI).

They also are required to take all subtests of the PLAN (the second test in the pre-ACT series) in the fall of the school year.[96] The PLAN will be administered again in the spring.

Eleventh-Grade Students
All eleventh-grade students are required to take the ACT or SAT by the end of the school year. MAS will monitor students' participation by using a spreadsheet and will report the subtest and composite scores for each student as well as the date the test was administered.

Twelfth-Grade Students
MAS will require all seniors to take the ACT or SAT in the fall of 2013. MAS will monitor students' participation by using a spreadsheet and will report the subtest and composite scores for each student. The spreadsheet needs to indicate the date (month/year) that each twelfth grader took the ACT or SAT.

Year-to-Year EXPLORE, PLAN, and ACT Progress
Scores from the EXPLORE, PLAN, and ACT will be used to track student progress from ninth to tenth and from tenth to eleventh or twelfth grades.

- EXPLORE to PLAN: At least 75.0% of the tenth-grade students who were at or above benchmark for any of the four subtests (English, math, reading, and science) or the composite score at the time of the fall 2012 EXPLORE test will remain at or above benchmark on the fall 2013 PLAN. Tenth graders who were below benchmark for any of the four subtests or the composite score at the time of the fall 2012 EXPLORE will either achieve benchmark(s) or have increased their score by one or more points by the time of the fall 2013 PLAN.

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[94] English, mathematics, reading, and science.

[95] The Educational Planning and Assessment System (EPAS), developed by the American College Testing (ACT) service, provides a longitudinal, standardized approach to educational and career planning, assessment, instructional support, and evaluation. The series includes the EXPLORE, PLAN, and ACT tests. Score ranges from all three tests are linked to *Standards for Transition* statements that describe what students have learned and what they are ready to learn next. The *Standards for Transition*, in turn, are linked to *Pathways* statements that suggest strategies to enhance students' classroom learning. *Standards* and *Pathways* can be used by teachers to evaluate instruction and student progress and advise students on courses of study.

[96] English, mathematics, reading, and science.

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- PLAN to ACT: At least 75.0% of the eleventh- or twelfth-grade students who were at or above benchmark for any of the four subtests (English, math, reading, and science) or the composite score at the time of either the fall 2011 or fall 2012 PLAN test will remain at or above benchmark on the 2013–14 ACT test. Eleventh- or twelfth-grade students who were below benchmark for any of the four subtests or the composite score at the time of the fall 2011 or fall 2012 PLAN will either achieve benchmark(s) or have increased their scores by one or more points by the time of the 2013–14 ACT.[97]

[97] Eleventh-grade students who took the ACT during the 2013–14 school year took the PLAN in the fall of 2012; twelfth-grade students who took the ACT during the 2013–14 school year took the PLAN in the fall of 2011.

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Learning Memo Data Addendum
Milwaukee Academy of Science

This addendum has been developed to clarify the data collection and submission process related to each of the outcomes stated in the school's learning memo for the 2013–14 academic year. Additionally, important principles applicable to all data collection must be considered.

1. All students attending the school at any time during the 2013–14 academic year should be included in all student data files created by the school. This includes students who enroll after the first day of school and students who withdraw before the end of the school year. Be sure to include each student's unique WSN in each data file.

2. All data fields must be completed for each student enrolled at any time during the school year. If a student is not enrolled and/or present when a measure is completed, record an N/E for that student to indicate "not enrolled." This may occur if a student enrolls after the beginning of the school year or withdraws prior to the end of the school year.

3. Record and submit a score/response for each student. Please do not submit aggregate data (e.g., 14 students scored 75.0%, or the attendance rate was 92.0%).

End-of-the-year data must be submitted to CRC by no later than the fifth working day after the end of the second semester, or June 20, 2014.

Staff person(s) responsible for year-end data submission: Chris Schwab (CS)

Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
Student Roster; Enrollment and Termination	For each student enrolled at any time during the year, include the following: • Wisconsin student number (WSN) • Local student ID • Student name • Grade • Gender • Race/ethnicity • Free/reduced lunch status (free, reduced, not eligible) • Enrollment date • Termination/withdrawal date, if applicable • Termination/withdrawal reason, if applicable, including if student was expelled and if so, the reason for expulsion • Assessed for special education (Y, eligible; Y, not eligible; N/A)	PowerSchool Note that enrollment and termination data for junior academy and high school students can be combined with the same data for elementary school students and sent to CRC in one spreadsheet.	Dena McCormick (DM)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
Attendance	For each student enrolled at any time during the year, include the following: • WSN • Student name • Number of days expected attendance • Number of days attended • Number of days excused absence • Number of days unexcused absence • Number of times out-of-school suspension • Number of days out-of-school suspension	PowerSchool Note that attendance data for high school students can be combined with the same data for elementary and junior academy school students and sent to CRC in one spreadsheet. Excused and unexcused absence and suspension data may be entered by class period for high school students.	DM
Parent Participation	For each student enrolled at any time during the year, include the following: • WSN • Student name • Conference 1 date • Attend conference 1 (parent, student, parent and student, none, N/A) • Conference 1 type (school, phone, home, none, N/A) • Conference 2 date • Attend conference 2 (parent, student, parent and student, none, N/A) • Conference 2 type (school, phone, home, none, N/A) • Conference 3 date • Attend conference 3 (parent, student, parent and student, none, N/A) • Conference 3 type (school, phone, home, none, N/A) Note: Conference data should be reported in aggregate rather than by student and teacher for each conference period (i.e., fall, winter, and spring). If a student's parent attends a conference with ANY teacher on the scheduled conference dates, in person at the school or the student's home or over the phone, that parent will be considered in attendance for the conference period. Indicate	Spreadsheet designed by school	Darrell Woodard (DW)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	attendance for each conference period in the columns outlined above.		
Special Education Needs Students	For each student assessed for special education needs (as indicated on the student roster), include the following: • WSN • Student name • Special education need, e.g., ED, CD, LD, OHI, etc. • Was student enrolled in special education services at MAS during previous school year (i.e., was student continuing special education or did special education services begin this year)? • Eligibility assessment date (date the team met to determine eligibility; may be during previous school year) • Eligibility re-evaluation date (three-year re-evaluation date to determine if child is still eligible for special education; may be during a subsequent school year) • IEP completion date (date the IEP in place during this school year was developed; may have been during a prior year; if initial, date will be this school year) • IEP review date (enter date the IEP was reviewed this year; if initial IEP was developed this year, enter N/A) • IEP review results, e.g., continue in special education, no longer eligible for special education, or NA • # goals on IEP in place this year OR on the initial IEP if this is the first year • # goals met on IEP at the time of annual review. Enter N/A if the IEP was new and was not reviewed this year.	Spreadsheet designed by school	Celia Kuhl (CK)
High School Graduation Plan	For each 9th- through 12th-grade student, include the following: • WSN	Spreadsheet designed by school	Lisa Youngvorst (LY)

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	• Student name • Graduation plan developed (Y, N) • Date graduation plan developed • Graduation plan includes post-secondary plans (Y, N, N/A) • Graduation plan includes a schedule that reflects credits required for graduating (Y, N, N/A) • Graduation plan includes evidence of parent/guardian/family involvement (Y; N; N, but plan was mailed; or N/A) • Schedule reviewed by guidance counselor (Y, N) • Student on track toward earning credits (Y, N) • Student needs to enroll in summer school (Y, N, N/A) For 11th- and 12th-grade students, include the following: • Guidance counselor met with student to discuss graduation plan (Y, N, N/A) • Date guidance counselor met with student		
High School Graduation Requirements	For each 9th- through 12th-grade student, include the following: • WSN • Student name • Number of credits earned during current school year • Number of cumulative credits earned at MAS and any other high school attended • If 9th through 11th grade, indicate if student was promoted to the next grade level (Y, N) • If 12th grade, indicate if student graduated (Y, N)	PowerSchool	LY
Academic Achievement: Local Measures Literacy	For 11th- and 12th-grade students, include the following: • WSN • Student name • Fall semester SRI Lexile reading level (or for new students, level	Spreadsheet designed by school	CS

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
	from the test given within 30 days of enrollment) • Spring semester SRI Lexile reading level Note that EXPLORE and PLAN data required for 9th- and 10th-grade local measure are described below.		
Academic Achievement: Local Measures Math	For each 11th- and 12th-grade student, include spring semester comprehensive course exam percentage correct. For all new 11th- and 12th-grade students, include WRAT results from the test administered within 30 days of enrollment. Note that EXPLORE and PLAN data required for the 9th- and 10th-grade local measure are described below.	Spreadsheet designed by school	CS
Academic Achievement: Local Measures Writing	For each student, enter the following: • WSN • Student name • Final total writing score	Spreadsheet designed by school	CS
Academic Achievement: Local Measures IEP	See "Special Education Needs Students" section above.	Spreadsheet designed by school	CK
Academic Achievement: Standardized Measures WKCE	For each 10th-grade student, include the following: • WSN • Student name • Proficiency level, scale score, and state percentile for WKCE math test • Proficiency level, scale score, and state percentile for WKCE reading test • Proficiency level and scale score for WKCE language arts test • Proficiency level and scale score for WKCE social studies test • Proficiency level and scale score for WKCE science test • Total writing score	Export results from the Turnleaf website to a spreadsheet. Also provide paper copies of all students' WKCE scores.	CS

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Learning Memo Section/Outcome	Data Description	Location of Data	Person(s) Responsible for Collecting Data
Academic Achievement: Standardized Measures EXPLORE	For each 9th-grade student, include the following: • WSN • Student name • EXPLORE English, mathematics, reading, science, and composite scores from fall test (also include scores for students who enrolled after fall test, but were tested within 30 days of enrollment) • Date of the fall EXPLORE, or date of EXPLORE if tested within 30 days of enrollment • EXPLORE English, mathematics, reading, science, and composite scores from spring test • Date of the spring test	Spreadsheet designed by school Also provide paper copies of all students' EXPLORE scores or data as provided by the test publisher.	CS
Academic Achievement: Standardized Measures PLAN	For each 10th-grade student, include the following: • WSN • Student name • PLAN English, mathematics, reading, science, and composite scores from fall test (also include scores for students who enrolled after fall test, but were tested within 30 days of enrollment) • Date of fall test, or date of test if tested within 30 days of enrollment • PLAN English, mathematics, reading, science, and composite scores from spring test • Date of spring PLAN	Spreadsheet designed by school Also provide paper copies of all students' PLAN scores or data as provided by the test publisher.	CS
Academic Achievement: Standardized Measures ACT or SAT	For each 11th- and 12th-grade student, include the following: • WSN • Student name • Took the ACT (Y, N, N/A) • Date student took the ACT • ACT English, mathematics, reading, science, and composite scores • Took the SAT (Y, N, N/A) • Date student took the SAT	Spreadsheet designed by school Also provide paper copies of all students' ACT scores or data as provided by the test publisher.	CS

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Appendix C

Trend Information

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Table C1 Milwaukee Academy of Science Enrollment					
Year	**Number Enrolled at Start of School Year**	**Number Enrolled During Year**	**Number Withdrew**	**Number at End of School Year**	**Number/ Percentage Enrolled for Entire School Year**
2008–09	954	36	99	891	867 (90.9%)
2009–10	969	14	111	872	858 (88.5%)
2010–11	1,054	32	133	953	926 (87.9%)
2011–12	1,039	40	128	951	914 (88.0%)
2012–13	965	25	140	850	829 (85.9%)
2013–14	958	42	111	889	849 (88.6%)

Table C2 Milwaukee Academy of Science Student Return Rates			
Year	**Number Enrolled at End of Previous Year***	**Number Enrolled at Start of This School Year**	**Student Return Rate**
2009–10	869	715	82.3%
2010–11	849	712	83.9%
2011–12	921	761	82.6%
2012–13**	869	688	79.2%
2013–14**	734	581	79.2%

*Includes only students enrolled at the end of the previous year who were eligible for enrollment again the following year.
**In 2012–13, the reenrollment calculation was modified to exclude students in the eighth AND twelfth grades during the previous school year; prior to that, only twelfth grade students were excluded.

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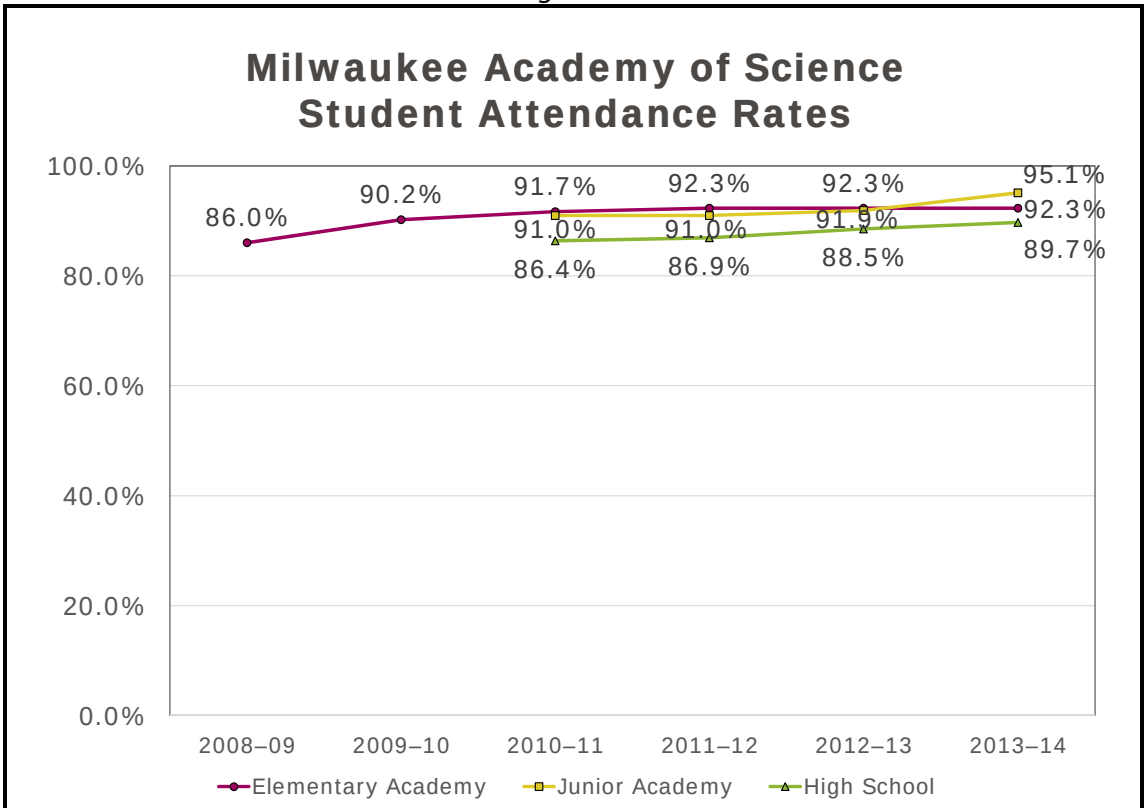
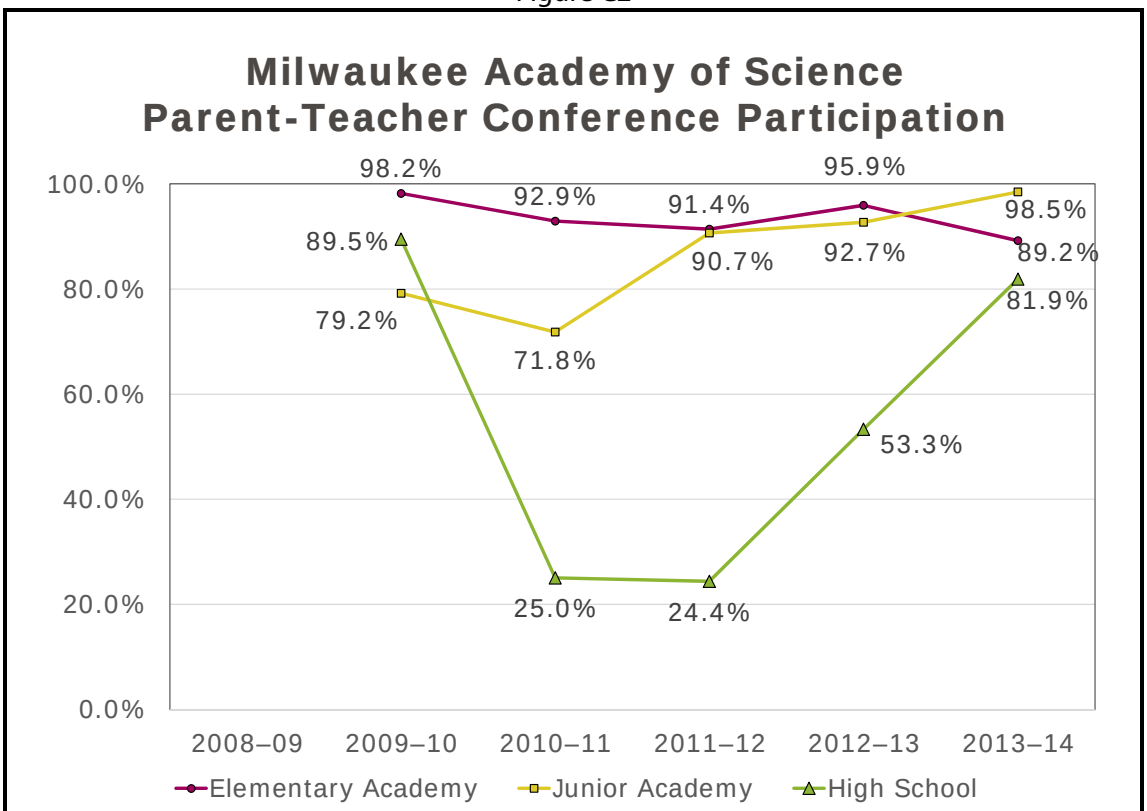
Figure C1



Note: Junior academy and high school attendance rates were not calculated separately until the 2010–11 school year.

Figure C2



Note: Conference attendance was not reported in 2008–09.

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Table C3 Milwaukee Academy of Science WKCE Year-to-Year Progress Students Who Remained Proficient Based on Former Proficiency-Level Cut Scores* 4th – 8th Graders		
School Year	**Reading**	**Math**
2008–09**	85.6%	74.1%
2009–10	89.4%	91.0%
2010–11	87.3%	87.1%
2011–12	88.0%	88.3%
2012–13	89.6%	88.9%
2013–14	87.6%	91.3%

*In 2012–13, the state began using revised cut scores; the former cut scores were applied to the 2012–13 data in order to examine progress from 2011–12 to 2012–13.
**Although not required, the school provided WKCE data.

Table C4 Milwaukee Academy of Science WKCE Year-to-Year Progress Students Who Were Minimal or Basic and Showed Improvement Based on Former Proficiency-Level Cut Scores 4th – 8th Graders		
School Year	**Reading**	**Math**
2008–09*	47.3%	52.3%
2009–10	63.9%	65.4%
2010–11	52.5%	64.4%
2011–12	63.8%	60.8%
2012–13	64.1%	47.6%
2013–14	39.7%	44.2%

*Although not required, the school provided WKCE data.

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Table C5 Milwaukee Academy of Science Teacher Retention					
Year	**Number at Beginning of School Year**	**Number Started After School Year Began**	**Number Terminated Employment During the Year**	**Number at End of School Year**	**Teacher Retention Rate: Number and Rate Employed at School for Entire School Year**
2009–10	64	0	2	62	62 (96.9%)
2010–11	67	1	1	67	66 (98.5%)
2011–12	80	4	4	80	76 (95.0%)
2012–13	72	4	3	72	69 (95.8%)
2013–14	73	5	1	77	72 (98.6%)

Table C6 Milwaukee Academy of Science Teacher Return[98]			
Year	**Number at End of Prior School Year**	**Number Returned at Beginning of Current School Year**	**Teacher Return Rate**
2009–10	64	47	73.4%
2010–11	57	53	93.0%
2011–12	63	49	77.8%
2012–13	72	59	81.9%
2013–14	61	53	86.9%

[98] This number excludes the teachers who were not offered contracts at the end of the previous school year due to either unacceptable performance or the elimination of an instructional position.

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Table C7 Milwaukee Academy of Science Percentage Proficient or Advanced WKCE Based on Former Proficiency-Level Cut Scores* 3rd Through 8th and 10th Graders			
School Year	**N**	**Reading**	**Math**
2008–09*	506	42.7%	26.5%
2009–10	492	50.6%	43.9%
2010–11	542	56.1%	50.5%
2011–12	549	64.3%	56.8%
2012–13	519	69.8%	58.4%
2013–14	468	64.5%	57.0%

*In 2012–13, the state began using NAEP-based cut scores; the old Wisconsin cut scores were applied to the 2012–13 data in order to compare data across years. NAEP proficiency-level cut scores are presented in Table C8.

Table C8 Milwaukee Academy of Science Percentage Proficient or Advanced WKCE Based on Revised Proficiency-Level Cut Scores 3rd Through 8th and 10th Graders			
School Year	**N**	**Reading**	**Math**
2012–13	519	7.5%	20.6%
2013–14	468	10.5%	19.7%

Table C9 Milwaukee Academy of Science CSRC Scorecard Score Using Former WKCE Cut Scores			
School Year	**K–8**	**High School**	**Combined Average***
2009–10	74.6%	67.3%	N/A
2010–11	73.9%	73.9%	N/A
2011–12	73.8%	69.4%	72.9%
2012–13	73.2%	77.1%	74.0%
2013–14	72.2%	78.1%	73.3%

*Based on a weighted average; weight is based on the number of students enrolled at the end of the school year. The weighted average was a new measure introduced in 2012–13 and calculated retroactively for the 2011–12 school year.

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Table C10 Milwaukee Academy of Science DPI Report Card Rating	
School Year	**Rating**
2011–12	62.1
2012–13	58.4

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Appendix D

Charter School Review Committee Scorecards

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City of Milwaukee Charter School Review Committee
School Scorecard

r: 4/11

K5–8TH GRADES

STUDENT ACADEMIC PROGRESS: GRADES 1–3		
• SDRT—% remained at or above GL	(4.0)	10%
• SDRT—% below GL who improved more than 1 GL	(6.0)	

STUDENT ACADEMIC PROGRESS: GRADES 3–8		
• WKCE reading—% maintained proficient and advanced	(7.5)	35%
• WKCE math—% maintained proficient and advanced	(7.5)	
• WKCE reading—% below proficient who progressed	(10.0)	
• WKCE math—% below proficient who progressed	(10.0)	

LOCAL MEASURES		
• % met reading	(3.75)	15%
• % met math	(3.75)	
• % met writing	(3.75)	
• % met special education	(3.75)	

STUDENT ACHIEVEMENT: GRADES 3–8		
• WKCE reading—% proficient or Advanced	(7.5)	15%
• WKCE math—% proficient or advanced	(7.5)	

ENGAGEMENT		
• Student attendance	(5.0)	25%
• Student reenrollment	(5.0)	
• Student retention	(5.0)	
• Teacher retention	(5.0)	
• Teacher return*	(5.0)	

HIGH SCHOOL

STUDENT ACADEMIC PROGRESS: GRADES 9, 10, and 12		
• EXPLORE to PLAN—Composite score at or above 17 on EXPLORE and at or above 18 on PLAN	(5.0)	30%
• EXPLORE to PLAN—Composite score of less than 17 on EXPLORE but increased 1 or more on PLAN	(10.0)	
• Adequate credits to move from 9th to 10th grade	(5.0)	
• Adequate credits to move from 10th to 11th grade	(5.0)	
• DPI graduation rate	(5.0)	

POSTSECONDARY READINESS: GRADES 11 and 12		
• Postsecondary acceptance for graduates (college, university, technical school, military)	(10.0)	15%
• % of 11th/12th graders tested	(2.5)	
• % of graduates with ACT composite score of 21.25 or more	(2.5)	

LOCAL MEASURES		
• % met reading	(3.75)	15%
• % met math	(3.75)	
• % met writing	(3.75)	
• % met special education	(3.75)	

STUDENT ACHIEVEMENT: GRADE 10		
• WKCE reading—% proficient and advanced	(7.5)	15%
• WKCE math—% proficient and advanced	(7.5)	

ENGAGEMENT		
• Student attendance	(5.0)	25%
• Student reenrollment	(5.0)	
• Student retention	(5.0)	
• Teacher retention	(5.0)	
• Teacher return*	(5.0)	

*Teachers not offered continuing contracts are excluded when calculating this rate.
Note: If a school has fewer than 10 students in any cell on this scorecard, CRC does not report these data. This practice was adopted to protect student identity. Therefore, these cells will be reported as not available (N/A) on the scorecard. The total score will be calculated to reflect each school's denominator.

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Beginning in 2012–13, the Wisconsin DPI applied more rigorous proficiency-level cut scores to the WKCE reading and math tests. These revised cut scores are based on standards set by NAEP and require students to achieve higher scale scores in order to be considered proficient. The K4 through eighth-grade and high school scorecards both include points related to current year and year-to-year performance on the WKCE. Last year, in order to examine the impact of the revised cut scores on the school's scorecard score, CRC compiled two K4 through eighth-grade and two high school scorecards, one each using the former WKCE cut scores and one each using the revised cut scores. However, because the CSRC standards and the scorecard were developed based on the former cut scores, CRC prepared only one K4 through eighth-grade and one high school scorecard this year using WKCE results and progress based on the former cut scores.

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Table D1

Milwaukee Academy of Science Elementary (K4–8th Grade)
Charter School Review Committee Scorecard
WKCE Scores Based on Former Cut Scores
2013–14 School Year

Area	Measure	Max. Points	% Total Score	Performance	Points Earned
Student Academic Progress 1st – 3rd Grades[99]	SDRT: % remained at or above GLE	4	**10%**	N/A	--
	SDRT: % below GLE who improved more than 1 GLE	6		N/A	--
Student Academic Progress 3rd – 8th Grades	WKCE reading: % maintained proficient and advanced*	7.5	**35%**	86.7%	6.5
	WKCE math: % maintained proficient and advanced*	7.5		91.3%	6.8
	WKCE reading: % below proficient who progressed*	10		39.7%	4.0
	WKCE math: % below proficient who progressed*	10		44.2%	4.4
Local Measures[100]	% met reading	3.75	**15%**	76.5%	2.9
	% met math	3.75		79.0%	3.0
	% met writing	3.75		71.7%	2.7
	% met special education	3.75		87.8%	3.3
Student Achievement 3rd – 8th Grades	WKCE reading: % proficient or advanced*	7.5	**15%**	64.5%	4.8
	WKCE math: % proficient or advanced*	7.5		57.0%	4.3
Engagement	Student attendance	5	**25%**	93.1%	4.7
	Student reenrollment[101]	5		78.8%	3.9
	Student retention rate	5		90.8%	4.5
	Teacher retention rate	5		86.9%	4.3
	Teacher return rate	5		98.6%	4.9
TOTAL		**90**[102]			**65.0 (72.2%)**

*WKCE scores in this report card were based on the former proficiency-level cut scores used up until the 2012–13 school year.

[99] The SDRT was discontinued prior to the 2013-14 school year; therefore, year-to-year measures related to the test were not available this year.

[100] When there were multiple measures per subject, the percent that met all four local measures was derived by combining the performance of students at different grade levels.

[101] Student was enrolled in K4 through seventh grade on the last day of the 2012–13 school year and was also enrolled on the third Friday of September 2013.

[102] The total possible points was reduced to 90 because the SDRT year-to-year measures were not available this year.

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Table D2

Milwaukee Academy of Science High School (9th–12th Grades)
Charter School Review Committee Scorecard
WKCE Scores Based on Former Cut Scores
2013–14 School Year

Area	Measure	Max. Points	% Total Score	Performance	Points Earned
Student Academic Progress	EXPLORE to PLAN: Composite score at or above 17 on EXPLORE and at or above 18 on PLAN	5	**30%**	Cannot report due to *n* size[104]	--
	EXPLORE to PLAN: Composite score of less than 17 on EXPLORE but increased 1 or more on PLAN	10		82.1%	8.2
9th to 10th Grade[103]	Adequate credits to move from 9th to 10th grade	5		62.3%	3.1
10th to 11th Grade	Adequate credits to move from 10th to 11th grade	5		84.2%	4.2
12th Grade	Graduation rate (DPI)[105]	5		97.4%	4.9
Postsecondary Readiness 11th and12th Grades	Postsecondary acceptance for graduates (college, university, technical school, military)	10.0	**15%**	95.0%	9.5
	% of 11th/12th graders tested	2.5		96.7%	2.4
	% of graduates with ACT composite score of 21.25 or more	2.5		5.0%	0.1
Local Measures[106]	% met reading	3.75	**15%**	78.8%	3.0
	% met math	3.75		54.9%	2.1
	% met writing	3.75		63.1%	2.4
	% met special education	3.75		87.5%	3.3
Student Academic Achievement 10th Grade	WKCE reading: % proficient and advanced*	7.5	**15%**	65.1%	4.9
	WKCE math: % proficient and advanced*	7.5		58.2%	4.4
Engagement	Student attendance	5	**25%**	89.7%	4.5
	Student reenrollment	5		80.9%[107]	4.0
	Student retention rate	5		79.9%	4.0
	Teacher retention rate	5		86.9%	4.3
	Teacher return rate	5		98.6%	4.9
TOTAL		**95**			**74.2 (78.1%)**

*WKCE scores in this report card were based on the former proficiency-level cut scores used up until the 2012–13 school year.

[103] EXPLORE is administered to ninth graders; PLAN is administered to tenth graders.

[104] Due to the N size of students who scored 17 or higher on the EXPLORE, CRC could not include results; therefore, five points were deducted from the total points possible.

[105] Four-year rate as of 2012–13; reported on DPI website: https://apps2.dpi.wi.gov/sdpr/district-report.action

[106] When there were multiple measures per subject for the reading and math local measures, the percent that met the measure was derived by combining the performance of students in different grade levels.

[107] Student was enrolled in ninth through eleventh grades on the last day of the 2012–13 school year and was also enrolled on the third Friday of September 2013.

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Appendix E

2012–13 Wisconsin Department of Public Instruction Report Card

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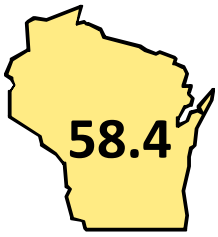
WISCONSIN DEPARTMENT OF PUBLIC INSTRUCTION

Milwaukee Acad of Science | Milwaukee Acad of Science

School Report Card | 2012-13 | Summary

Overall Accountability Score and Rating



Meets Few Expectations

Overall Accountability Ratings	Score
Significantly Exceeds Expectations	83-100
Exceeds Expectations	73-82.9
Meets Expectations	63-72.9
Meets Few Expectations	53-62.9
Fails to Meet Expectations	0-52.9

Priority Areas	School Score	Max Score	K-12 State	K-12 Max
Student Achievement	**37.1/100**		**67.1/100**	
Reading Achievement	14.0/50		30.1/50	
Mathematics Achievement	23.1/50		37.0/50	
Student Growth	**64.1/100**		**60.9/100**	
Reading Growth	30.5/50		30.0/50	
Mathematics Growth	33.6/50		30.9/50	
Closing Gaps	**72.5/100**		**66.8/100**	
Reading Achievement Gaps	16.5/25		16.8/25	
Mathematics Achievement Gaps	18.5/25		16.3/25	
Graduation Rate Gaps	37.5/50		33.7/50	
On-Track and Postsecondary Readiness	**79.9/100**		**83.8/100**	
Graduation Rate (when available)	72.4/80		71.6/80	
Attendance Rate (when graduation not available)	NA/NA		NA/NA	
3rd Grade Reading Achievement	2.6/10		2.9/5	
8th Grade Mathematics Achievement	4.9/10		3.6/5	
ACT Participation and Performance	NA/NA		5.7/10	

Student Engagement Indicators	Total Deductions: -5
Test Participation Lowest Group Rate (goal ≥95%)	Goal met: no deduction
Absenteeism Rate (goal <13%)	Goal not met: -5
Dropout Rate (goal <6%)	Goal met: no deduction

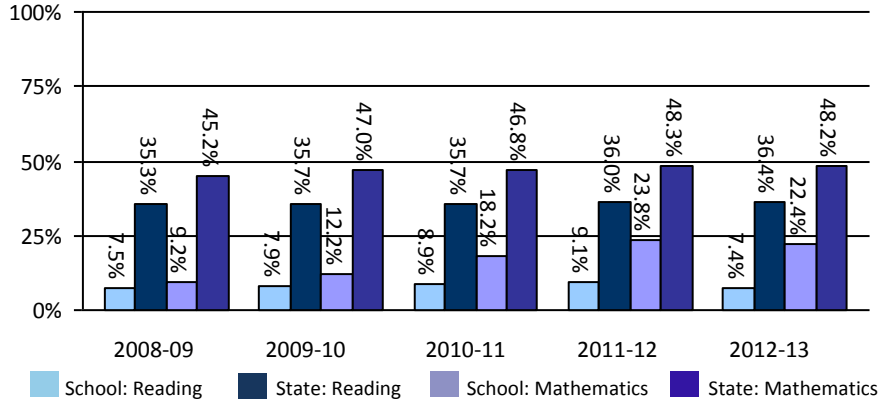
School Information

Grades	K4-12
School Type	Elementary/Secondary Combined
Enrollment	967
Race/Ethnicity	
American Indian or Alaska Native	0.1%
Asian or Pacific Islander	0.0%
Black not Hispanic	98.3%
Hispanic	1.0%
White not Hispanic	0.5%
Student Groups	
Students with Disabilities	11.0%
Economically Disadvantaged	90.7%
Limited English Proficient	0.1%

Wisconsin Student Assessment System Percent Proficient and Advanced

Includes Wisconsin Knowledge and Concepts Examination (WKCE) and Wisconsin Alternate Assessment for Students with Disabilities (WAA-SwD). WKCE college and career readiness benchmarks based on National Assessment of Educational Progress.

State proficiency rate is for all tested grades: 3-8 and 10



Notes: Overall Accountability Score is an average of Priority Area Scores, minus Student Engagement Indicator deductions. The average is weighted differently for schools that cannot be measured with all Priority Area Scores, to ensure that the Overall Accountability Score can be compared fairly for all schools. Accountability Ratings do not apply to Priority Area Scores. Details can be found at http://acct.dpi.wi.gov/acct_accountability.

This report serves for both school and district accountability purposes for this school.

Appendix F

Teacher Interview Results

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In the spring of 2014, CRC interviewed 17 teachers regarding their reasons for teaching and overall satisfaction with the school. Interviews included teachers from each level of the school: primary/elementary academy, junior academy, and high school. Some of the teachers were general classroom teachers while others specialized in subjects such as science, social studies, language arts, math, or special education.

The teachers interviewed had been teaching for an average of 6.8 years. The number of years teaching at MAS ranged from one to nine years.

All teachers reported that they routinely use data to make decisions in the classroom and that the school's leadership uses data to make school-wide decisions. Methods of tracking student progress on the school's local measures included a variety of reading and math tests, including the PALS, SRI, and MAP as well as teacher and curriculum assessments in different subject areas.

Four (23.5%) teachers rated the school's overall progress in contributing to students' academic progress as excellent and 13 (76.5%) rated the school's progress as good.

When asked to describe how teacher performance is assessed, all teachers reported that they are formally assessed at least once each year. All teachers are observed in the classroom, discuss student progress/data, and receive informal feedback/suggestions at least once every semester (Table F1).

Table F1

Milwaukee Academy of Science
Teacher Performance Assessment
2013–14
(N = 17)

Type of Assessment	Frequency							
	Never		At Least Monthly or More Often		At Least Once Each Semester		At Least Once Yearly	
	N	%	N	%	N	%	N	%
Formal evaluation using evaluation form	0	0.0%	3	17.6%	8	47.1%	6	35.3%
Classroom observations	0	0.0%	12	70.6%	5	29.4%	0	0.0%
Discussions regarding student progress/data	0	0.0%	16	94.1%	1	5.9%	0	0.0%
Informal feedback/suggestions	0	0.0%	15	88.2%	2	11.8%	0	0.0%

All 17 teachers said that their performance reviews incorporate students' academic progress or performance. A variety of administrators and directors from each academy conducted teacher reviews. Five of the teachers are very satisfied with the review process, eight are somewhat satisfied, and four are somewhat dissatisfied.

Of the 17 teachers, 16 (94.1%) reported plans to continue teaching at the school.

All teachers rated educational methodology, general atmosphere, and students as somewhat important or very important reasons for continuing to teach at this school (Table F2).

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Table F2 Reasons for Continuing to Teach at Milwaukee Academy of Science 2013–14 (N = 17)				
Reason	**Importance**			
	Very Important	**Somewhat Important**	**Somewhat Unimportant**	**Not at All Important**
Location	0	8	1	8
Financial considerations	4	8	4	1
Educational methodology/ curriculum approach	7	10	0	0
Age/grade level of students	12	4	1	0
Discipline	6	9	2	0
General atmosphere	12	5	0	0
Class size	8	6	2	1
Parental involvement	5	5	4	3
Administrative leadership	9	7	1	0
Colleagues	15	1	1	0
Students	12	5	0	0

CRC asked teachers to rate the school's performance related to class size, materials and equipment, and student assessment plan, as well as shared leadership, professional support and development, and the school's progress toward becoming an excellent school. Teachers most often rated class size and professional development opportunities as excellent. Program of instruction, measures for assessing student progress, student academic progress, parent/teacher relationships, teacher collaboration, performance as a teacher, and principal's performance were most often rated as good by teachers. Five (29.4%) of the 17 teachers listed the school's progress toward becoming a high performing school as excellent, eight (47.1%) teachers listed the school's progress as good, and four (23.5%) teachers rated the school's progress as fair (Table F3).

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Table F3 Milwaukee Academy of Science School Performance Rating 2013–14 (N = 17)				
Area	**Rating**			
	Excellent	**Good**	**Fair**	**Poor**
Class size/student-teacher ratio	8	7	1	1
Program of instruction	3	8	6	0
Measures for assessing students' progress overall	5	11	1	0
Shared leadership, decision making, and accountability	4	7	6	0
Professional support	7	7	2	1
Professional development opportunities	8	3	4	2
Progress toward becoming a high-performing school	5	8	4	0
Your students' academic progress	7	10	0	0
Adherence to discipline policy	3	7	4	3
Instructional support	7	5	5	0
Parent/teacher relationships	3	10	3	1
Teacher collaboration to plan learning experiences	6	8	1	2
Parent involvement	0	5	12	0
Your performance as a teacher	6	11	0	0
Principal's performance	5	10	2	0

When asked to name two things they liked most about the school, teachers most frequently noted the following.

- The overall atmosphere within the school of collaboration and high expectations for staff performance and students' academic achievement.
- Their colleagues. Teachers were seen as creative, altruist, enthusiastic, and committed to their students and their academic performance.
- The administration, including the associate principal and achievement director, provide support and specific directions to the teachers. In addition, there is good communication and openness for input from teachers and respect for their expertise.

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Teachers most often mentioned the following as things they like least about the school.

- The school's discipline policies change too frequently and are not implemented consistently.
- The parents are only minimally involved in the school and with their student's learning.
- The time commitment needed to meet the demands of the job.
- The reward systems do not encourage the long-term retention of teachers.

Several teachers identified the following as barriers that could affect their decision to remain at the school.

- The salaries are too low.
- The inconsistent implementation of policies related to discipline and homework completion.
- The limited amount of communication with and feedback received from administration.

When asked if they have any suggestions for improving the school, teachers placed the heaviest emphasis on the following.

- Administration and teachers need to get on the same page regarding curriculum and student behaviors.
- The compensation for veteran teachers needs to increase as an incentive for them to stay. This would make the teams stronger and enable more students to get the desired (better) outcomes.
- Communication needs to be expanded between the academies, especially among transition groups, and teachers need to be allowed more input in decision-making processes.

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Appendix G

Parent Survey/Interview Results

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Parent opinions are qualitative in nature and provide a valuable measurement of school performance. To determine how parents heard about the school, why they elected to send their children to the school, parental involvement with the school, and an overall evaluation of the school, each school distributed surveys during spring parent-teacher conferences. The school asked parents to complete the survey, place it in a sealed envelope, and return it to the school. CRC made at least two follow-up phone calls to parents who had not completed a survey. If these parents were available and willing, CRC completed the survey over the telephone or sent a new survey in the mail. Of 574 families, 241 (42.0%) completed and submitted surveys to CRC.[108]

Most (73.0%) of the parents who completed a survey heard about the school from friends or relatives. Smaller proportions heard about the school through other means (Table G1).

Table G1

Milwaukee Academy of Science
How Parents Learned About the School
2013–14
(N = 241)

Method	Response	
	N	%
Newspaper	3	1.2%
Private school	1	0.4%
Community center	1	0.4%
Church	0	0.0%
Friends/relatives	176	73.0%
TV/radio/Internet	13	5.4%
Other	59	24.5%

Parents chose to send their children to MAS for a variety of reasons. Most rated the school's general atmosphere (86.7%) and educational methodology (94.2%) as very important reasons for selecting this school. In addition, nearly all parents (97.9%) rated school safety as very important to them when choosing this school (Table G2).

Some parents (32.8%) identified other reasons for enrolling their child in the school, including activities, the fact that it is a charter school, academic performance, curriculum, and personal recommendations from friends and family (not shown).

[108] If more than one parent in the family or household completed a survey, both were included. If one parent completed more than one survey, the survey completed for the oldest child was retained for analysis.

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Table G2 Milwaukee Academy of Science Parent Reasons for Choosing the School 2013–14 (N = 241)										
Factor	Response									
	Very Important		Somewhat Important		Somewhat Unimportant		Not at All Important		No Response	
	N	%	N	%	N	%	N	%	N	%
Location	137	56.8%	68	28.2%	5	2.1%	29	12.0%	2	0.8%
Other children or relative already attending this school	99	41.1%	49	20.3%	8	3.3%	84	34.9%	1	0.4%
Educational methodology	227	94.2%	8	3.3%	0	0.0%	3	1.2%	3	1.2%
Range of grades in school	180	74.7%	40	16.6%	6	2.5%	12	5.0%	3	1.2%
Discipline	203	84.2%	27	11.2%	2	0.8%	7	2.9%	2	0.8%
General atmosphere	209	86.7%	27	11.2%	1	0.4%	1	0.4%	3	1.2%
Class size	178	73.9%	50	20.7%	3	1.2%	9	3.7%	1	0.4%
Recommendation of family and friends	109	45.2%	74	30.7%	17	7.1%	40	16.6%	1	0.4%
Opportunities for parental participation	171	71.0%	57	23.7%	5	2.1%	4	1.7%	4	1.7%
School safety	236	97.9%	3	1.2%	0	0.0%	1	0.4%	1	0.4%
Frustration with previous school	97	40.2%	38	15.8%	17	7.1%	84	34.9%	5	2.1%

CRC examined parental involvement as another measure of satisfaction with the school. Involvement was based on the number of contacts between the school and the parent and parent participation in educational activities in the home.

For the first measure (parent-school contact), contacts occurred for a variety of reasons. For example, most parents reported contact with the school at least once regarding their child's academic progress or behavior (Table G3).

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Table G3 Milwaukee Academy of Science Parent-School Contacts 2013–14 (N = 241)										
Areas of Contact	Number of Contacts									
	0 Times		1–2 Times		3–4 Times		5+ Times		No Response	
	N	%	N	%	N	%	N	%	N	%
Your child(ren)'s academic performance	23	9.5%	54	22.4%	68	28.2%	93	38.6%	3	1.2%
Your child(ren)'s behavior	26	10.8%	59	24.5%	43	17.8%	110	45.6%	3	1.2%
Providing information for school records	93	38.6%	89	36.9%	26	10.8%	26	10.8%	7	2.9%
Other	39	16.2%	11	4.6%	10	4.1%	6	2.5%	175	72.6%
Graduation and postsecondary plans (n=77)*	30	39.0%	27	35.1%	13	16.9%	7	9.1%	--	--

*Only parents of high school students responded to this question.

The second measure examined the extent to which parents engaged in educational activities while at home. During a typical week, a majority (92.8%) of 182 parents of younger children (K4 through fifth grade) worked on homework with their children; read to or with their children (85.2%); watched educational programs on television (76.9%); and/or participated in activities such as sports, library visits, or museum visits with their children (70.3%). Parents of older children (sixth through twelfth grades) engaged in similar activities during the week. For example, 95.7% of 140 parents monitored homework completion, 90.7% discussed their children's postsecondary plans with them, 90.7% watched educational programs on television, 90.0% participated in activities outside of school, and 90.8% discussed their children's progress toward graduating with them at least once a month (not shown).

Parents also rated the school on various aspects using a scale from poor to excellent. Parents rated the school as good or excellent in most aspects of the academic environment. For example, most parents said their child's academic progress (91.9%) and communication regarding learning expectations (83.8%) were excellent or good (Table G4.)

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Table G4 Milwaukee Academy of Science Parental Satisfaction 2013–14 (N = 241)										
Area	Response									
	Excellent		Good		Fair		Poor		No Response	
	N	%	N	%	N	%	N	%	N	%
Program of instruction	148	61.4%	72	29.9%	16	6.6%	2	0.8%	3	1.2%
Child's academic progress	154	63.9%	66	27.4%	14	5.8%	6	2.5%	1	0.4%
Student-teacher ratio/ class size	113	46.9%	91	37.8%	31	12.9%	4	1.7%	2	0.8%
Discipline methods	112	46.5%	65	27.0%	36	14.9%	26	10.8 %	2	0.8%
Parent-teacher relationships	138	57.3%	62	25.7%	32	13.3%	8	3.3%	1	0.4%
Communication regarding learning expectations	147	61.0%	55	22.8%	29	12.0%	9	3.7%	1	0.4%
Opportunities for parental involvement	140	58.1%	70	29.0%	25	10.4%	5	2.1%	1	0.4%
Teacher(s)'s performance	133	55.2%	72	29.9%	30	12.4%	4	1.7%	2	0.8%
Principal's performance	120	49.8%	72	29.9%	30	12.4%	12	5.0%	7	2.9%
Teacher/principal availability	118	49.0%	72	29.9%	41	17.0%	9	3.7%	1	0.4%
Responsiveness to concerns	110	45.6%	80	33.2%	29	12.0%	18	7.5%	4	1.7%
Progress reports for parents	150	62.2%	63	26.1%	19	7.9%	4	1.7%	5	2.1%
Graduation plan: Credits earned (n=90)*	45	50.0%	31	34.4%	14	15.6%	0	0.0%	--	--
Graduation plan: Postsecondary plans (n=89)*	42	47.2%	37	41.6%	10	11.2%	0	0.0%	--	--
Assistance with application process for postsecondary options/college (n=81)*	30	37.0%	35	43.2%	13	16.0%	3	3.7%	--	--

*Out of parents with high school students who responded to the question.

Parents indicated their level of agreement with several statements about school staff. Most (87.1%) reported that they were comfortable talking with their child's teachers and/or school staff, and many (86.3%) were satisfied with how the school kept them informed about their child's academic performance (Table G5).

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Table G5 Milwaukee Academy of Science Parental Rating of School Staff 2013–14 (N = 241)												
Statement	Response											
	Strongly Agree		Agree		Neutral		Disagree		Strongly Disagree		No Response	
	N	%	N	%	N	%	N	%	N	%	N	%
I am comfortable talking with staff	142	58.9%	68	28.2%	21	8.7%	9	3.7%	1	0.4%	0	0.0%
The staff keeps me informed about my child(ren)'s performance	143	59.3%	65	27.0%	18	7.5%	12	5.0%	3	1.2%	0	0.0%
I am comfortable with how the staff handles discipline	98	40.7%	66	27.4%	38	15.8%	28	11.6%	10	4.1%	1	0.4%
I am satisfied with the overall performance of the staff	114	47.3%	76	31.5%	35	14.5%	13	5.4%	3	1.2%	0	0.0%
The staff recognizes my child(ren)'s strengths and weaknesses	127	52.7%	78	32.4%	22	9.1%	12	5.0%	0	0.0%	2	0.8%

Parental satisfaction was also evident in the following results.

- Most (90.0%) parents would recommend this school to other parents.
- Most (79.7%) parents will send their child to the school next year. A total of 18 (7.5%) parents said they will not send their child to the school next year and some (12.9%) were not sure. Most parents who said they would not cited that the child graduated, the child transferred to a different school for other opportunities, or there were unspecified problems during the last school year.
- When asked to rate the school's overall contribution to their child's learning, a majority (86.8%) of parents rated the school's overall contribution to their child's learning as excellent or good. Some (11.2%) parents rated the school's contribution as fair and a small percentage (1.2%) rated the school's contribution as poor. Two parents did not respond to the question.

When asked what they like most about the school, some common responses included the following.

- The science emphasis and rigor of the curriculum. The students are challenged and supported in the acquisition of competencies that will enable them to go to college and succeed in life. The curriculum is individualized and enables children to learn and experience success in the academic pursuits.
- The administrative and teaching staff are responsive to the needs of the students and make every effort to keep parents engaged in their child's learning process.

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Interactions with MAS staff made parents appreciative of the care and concern they provide to their child. The staff give their all to teaching the children, and their positive relationships contribute to the progress children experience at this school.

- The school has an open door policy and parental communication with school staff is very good. Parents cited regular updates on child academic and behavioral performance at the school. Parents appreciate the expectation for parental involvement, which they stated helps overall student progress in school.

When asked what they like least about the school, the most prevalent responses included the following.

- The discipline policy needs improvement and staff need to be better prepared to handle students' problem behaviors. There was concern about bullying at the school and especially on the bus. Some parents felt the discipline policies related to uniforms were too strict. Other parents complained that the school called them too frequently about what they considered to be minor issues.

- The school staffing levels were not adequate to handle students' needs, provide adequate extracurricular activities or field trips, or offer art and foreign language classes at all grade levels.

- Communication with parents was not consistent and sometimes it was not clear what was expected of the parents in relation to classwork and homework. Some parents were also concerned that activities conflicted with their work schedules and limited their ability to participate in events.

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Appendix H

Student Interview Results

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At the end of the school year, CRC staff asked 12 randomly selected eighth-grade students and 12 randomly selected tenth, eleventh, and twelfth grade students several questions about their school. Responses from the student interviews were generally positive.

- All 24 students indicated that they used computers at school;
- All students said that teachers were helpful;
- A total of 20 (83.3%) students thought the marks they received on their classwork, homework, and report cards were fair;
- All students said they improved their reading ability and 21 students said their math ability has improved;
- Of 24 students, 23 (95.8%) said that they felt safe while at school; and
- All students said that people worked collaboratively at MAS (Table H).

When asked if teachers talk to seventh and eighth graders about high school, all 12 students said that these issues were discussed with some regularity. CRC asked high school students about graduation and college plans. Of 12 students, 11 (91.7%) said that they have a high school graduation plan and all 12 said that their teachers talk to them about college. A total of 11 students reported that they plan to go to college and one student was not sure (not shown).

Table H

Milwaukee Academy of Science
Student Interview
2013–14
(N = 24)

Question	Answer			
	A Lot	Some	No/Not At All	No Response/ Don't Know/ N/A
Do you like your school?	14	9	1	0
Have you improved in reading?	15	9	0	0
Have you improved in math?	12	9	3	0
Do you use computers at school?	20	4	0	0
Do you like the school rules?	3	12	8	0
Do you think the school rules are fair?	5	14	5	0
Do you get homework on a regular basis?	15	9	0	0
Do your teachers help you at school?	19	5	0	0
Do you like being in school?	15	8	1	0
Do you feel safe at school?	21	2	1	0

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Table H Milwaukee Academy of Science Student Interview 2013–14 (N = 24)				
Question	**Answer**			
	A Lot	**Some**	**No/Not At All**	**No Response/ Don't Know/ N/A**
Do people work together in school?	15	9	0	0
Do you feel the marks you get on classwork, homework, and report cards are fair?	11	9	4	0
Do your teachers talk to your parents?	9	14	1	0
Does your school have afterschool activities?	17	7	0	0

When asked what they liked best about the school, students most frequently reported the following.

- The classes are challenging and the curriculum is rigorous.
- The overall environment is amazing. The school feels like a family because of the closeness between staff and students.
- The teachers help students learn and care about their education.

When asked what they liked least, several students responded as follows.

- School rules
- Uniforms
- Lunch
- Limited fun activities

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Appendix I

Board Interview Results

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Board member opinions are qualitative in nature and provide valuable, although subjective, insight regarding school performance and organizational competency. MAS's board of directors consists of 19 members: president, vice president, treasurer and secretary, and 16 other members.[109] CRC conducted phone interviews using a prepared interview guide with 17 of the 19 board members who agreed to participate.

Two of the board members have served on the board for less than one year, nine for one to five years, three for six to eight years, and three for 10 or more years. The backgrounds of the board members include business, fundraising, research, education, administration, management, community connections, networking, banking, expertise in problem solving, medicine, and business ownership. Some of the board members are also parents of MAS students.

A total of 11 board members said they participate in strategic planning for the school. All 16 who responded to the item received a presentation on the school's annual academic performance report. All 17 received and approved the school's annual budget, and all 16 members who answered the question reviewed the school's annual financial audit (not shown).

Table I

Milwaukee Academy of Science
Board Member Interview Results
2013–14
(N = 17)

Performance Measure	Response				
	Excellent	Good	Fair	Poor	Don't Know
Teacher-student ratio/class size	5	6	3	0	3
Program of instruction	4	9	2	0	2
Students' academic progress	2	9	6	0	0
Adherence to discipline policy	8	6	1	0	2
Administrator's financial management	8	6	1	0	2
Professional development opportunities	3	7	1	0	6
Instructional support[110]	5	6	2	0	3
Progress toward becoming a high-performing school	1	8	6	0	2
Parental involvement	0	3	8	3	3
Community/business involvement	4	5	5	0	3
Teachers' performance	4	10	2	0	1
Principal's performance	9	7	0	0	1
Current role of the board of directors	6	9	1	0	1
Financial resources to fulfill school's mission	0	7	8	1	1
Safety of the educational environment	5	10	0	0	2

[109] There are also four emeritus board members, who were not contacted for interviews.

[110] One member rated this item between excellent and good; that response is not included in the table.

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All 17 members reported that the board uses data to make decisions regarding the school.

On a scale of poor to excellent, 16 (94.1%) of 17 board members rated the school, overall, as excellent or good; one member rated the school as fair.

When asked what they liked most about the school, the board members frequently mentioned the following.

- The dedication and commitment of the staff to the school's mission and the students served by the school.
- The mission and philosophy of MAS provides low-income urban youth with important alternatives for successful careers that will enable them to be responsible and productive adults.
- The board composition, including the leaders of all the Milwaukee-area institutions of higher learning, makes it extremely qualified to provide strong leadership and support for the school's overall mission as well as its educational practices.

Regarding things they like least, the board members mentioned the following.

- The financial resources or revenue streams are not sufficient and hinder the school's ability to achieve its mission. This problem is exacerbated by the need to cover the cost of student busing.
- There is limited parental involvement and support for the school and for the students' learning process.
- There continues to be a lack of excellent scholastic performance and adequate academic progress within the student population. There is some reticence to change and not always a sense of urgency to drive the school to be excellent.

When asked for one suggestion for improving the school, several board members stated the following.

- The board needs to develop additional strategies to raise more resources so that the school can better meet student needs. This will require better marketing of the school, including better communication of the school's positive achievements.
- The board and staff need to find better ways to involve more parents in the school and in their children's learning processes.
- The school needs to undertake the task of creating a "first grade strategic plan," including the commitment to take a hard look at the school's mission and philosophy and to determine what the school is about in the short and long term.

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