

A PROFILE OF 2012 ACT EXPLORE[®] –
AND ACT PLAN[®]–TESTED STUDENTS

Building Momentum: The Condition of Progress Toward College Readiness

ACT[®]

About *Building Momentum: The Condition of Progress Toward College Readiness*

ACT has collected and reported data on students' academic readiness for college since 1959. As a trusted nonprofit leader in research on college and career readiness, ACT is committed to continuing our efforts to provide data and information to help solve the daunting problems faced by our nation. ACT is designing research and data to provide insights not only on academic achievement but also on student behavior and goals. When combined, these insights will help individuals better prepare for success throughout their lives, from Kindergarten through Career. These new efforts will broaden and extend our core mission: helping people achieve education and career success.

This report provides a look at the progress toward college readiness made by middle school students and students at the midpoint of high school who took ACT Explore® and ACT Plan® during the 2011–12 school year.¹ The data in this report provide insights that will help inform and guide efforts to improve college and career readiness for the next generation of students now making their way through the US education system.

What Is the ACT College and Career Readiness System?

The ACT college and career readiness system provides a suite of integrated, curriculum-based assessments designed to measure progress over time. The system has components to assess English, math, reading, and science skills, as well as

behavioral aspects and career interests. The system includes three components: ACT Explore, ACT Plan, and the ACT® college readiness assessment. These assessments are curriculum based and take a longitudinal approach to assessment, career and educational planning, instructional support, and evaluation.

What Are ACT Explore and ACT Plan?

ACT Explore is the first assessment in the ACT college and career readiness system and is typically administered to 8th- and 9th-grade students. ACT Plan, typically administered to 10th graders, serves as the midpoint measure of academic progress in the series. Like the ACT, both ACT Explore and ACT Plan are standardized academic achievement tests which measure student learning in four subject areas: English, Reading, Mathematics, and Science.

What Do the ACT Explore and ACT Plan College Readiness Benchmarks Mean for College Readiness?

The ACT Explore and ACT Plan College Readiness Benchmarks² can be used to gauge a student's progress in the 8th and 10th grades toward becoming college ready. These Benchmarks gauge this progress by estimating a student's probability of successfully meeting the four ACT College Readiness Benchmarks. Students who meet a Benchmark on ACT Explore or ACT Plan are likely to

¹ The data in this report are derived from the 2007–08 to 2011–12 ACT Explore and ACT Plan national data release files. Students were excluded from analyses if they tested under extended time or participated in an equating study. ACT Explore analyses were limited to 8th-grade participants, and ACT Plan analyses were limited to 10th-grade participants. Students were only included if they had a valid (non-missing) Composite score. For the 2011–12 ACT Explore cohort, N = 925,130; for the 2011–12 ACT Plan cohort, N = 1,249,204.

² The ACT Explore and ACT Plan College Readiness Benchmarks used in this report are aligned for the sample of students described in Note 1. During the preparation of this report, new ACT College Readiness Benchmarks were developed for students taking ACT Explore and ACT Plan during the 2012–13 school year. These new Benchmarks differ from those used in this report. For more information, please see the "Notes" section of this report.

have a 50% chance of earning a B or higher or about a 75% chance of earning a C or higher in the corresponding college courses by the time they graduate from high school.

ACT uses data from the ACT to measure information about academic performance in the context of college and career readiness for *The Condition of College & Career Readiness*, which is published annually. However, looking at progress toward college readiness during the middle school and early high school years—focusing on the number or percentages of students meeting or exceeding the ACT Explore and ACT Plan Benchmarks—adds to the college readiness conversation by providing meaningful and compelling information about the earlier academic achievement of students. For students, parents, teachers, and other educators, having such information early provides more opportunity to capitalize on academic strengths, address academic challenges, and better plan for high school and college. This report highlights that information.

This report is organized into four sections:

- **Progress Toward College Readiness**—the percentage of students meeting the ACT Explore and ACT Plan College Readiness Benchmarks in each subject area
- **Access**—the number of students exposed to ACT Explore or ACT Plan
- **Academic Performance**—student test performance
- **Policy and Practice Recommendations for Increasing Readiness**—policies and practices states and schools can implement to improve the college readiness of students

ACT encourages educators to focus on trends (e.g., three, five, 10 years), not year-to-year changes, which can represent normal—even expected—fluctuations. Trend lines offer more insight into what is happening in a school, district, state, or the nation than can data from any single year.

Contents

Progress Toward College Readiness	6
ACT Explore Benchmarks by Subject	6
ACT Plan Benchmarks by Subject	6
ACT College Readiness Benchmarks—On Target and Attained	7
ACT Explore Benchmarks Over Time	8
ACT Plan Benchmarks Over Time	8
ACT Explore Benchmarks—Attainment and Near Attainment	9
ACT Plan Benchmarks—Attainment and Near Attainment	9
Number of ACT Explore Benchmarks Attained	10
Number of ACT Plan Benchmarks Attained	10
ACT Explore Benchmarks by Race/Ethnicity	11
ACT Plan Benchmarks by Race/Ethnicity	11
Access	12
Percent of 8th Graders Who Took ACT Explore by State	12
Percent of 10th Graders Who Took ACT Plan by State	12
Number of 8th Graders Who Took ACT Explore by Race/Ethnicity	13
Number of 10th Graders Who Took ACT Plan by Race/Ethnicity	14
Academic Performance	15
ACT Explore Scores Over Time	15
ACT Plan Scores Over Time	15
ACT Explore Scores Over Time by Race/Ethnicity	16
ACT Plan Scores Over Time by Race/Ethnicity	16
Policy and Practice Recommendations for Increasing Readiness	17
High Academic Expectations for All Students	17
Rigorous Course Content Aligned to Readiness	17
Early, Consistent Monitoring of Progress Toward Readiness	18
Early Implementation of Interventions	18
Use of Data-Based Decision Making	18
Notes	19
ACT College Readiness Benchmarks	19

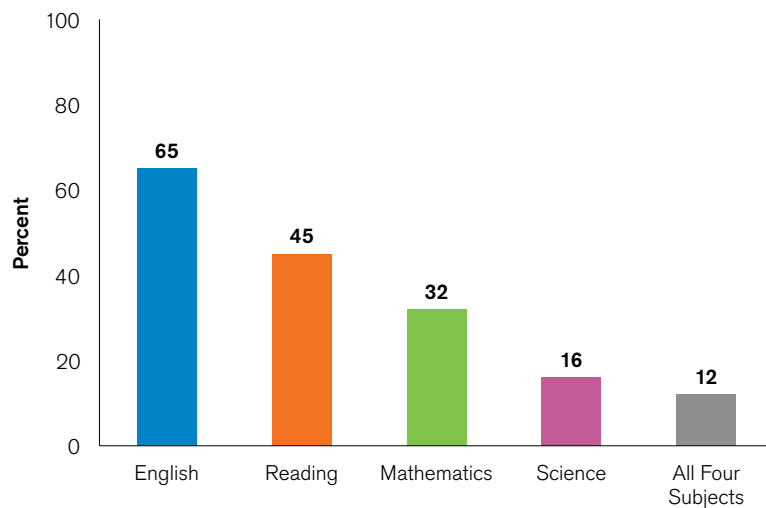
Progress Toward College Readiness

ACT Explore Benchmarks by Subject

The relative percentages of students meeting the ACT Explore College Readiness Benchmarks in 2012 were similar to the percentages of students meeting the ACT College Readiness Benchmarks, with the English Benchmark being the most commonly met, followed by the Reading, Mathematics, and Science Benchmarks, respectively.

In 2012, 65% of all ACT Explore–tested 8th graders met the English Benchmark, while only 12% met the Benchmark in all four subjects.

Percent of ACT Explore–Tested 8th Graders Meeting ACT Explore Benchmarks by Subject, 2012

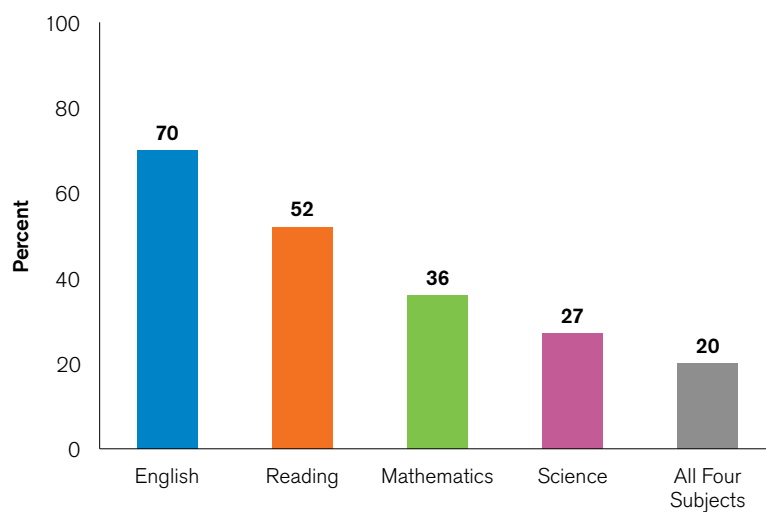


ACT Plan Benchmarks by Subject

The relative percentages of students meeting the ACT Plan College Readiness Benchmarks in 2012 were similar to the percentages of students meeting the ACT College Readiness Benchmarks, with the English Benchmark being the most commonly met, followed by the Reading, Mathematics, and Science Benchmarks, respectively.

In 2012, 70% of all ACT Plan–tested 10th graders met the English Benchmark, while only 20% met the Benchmark in all four subjects.

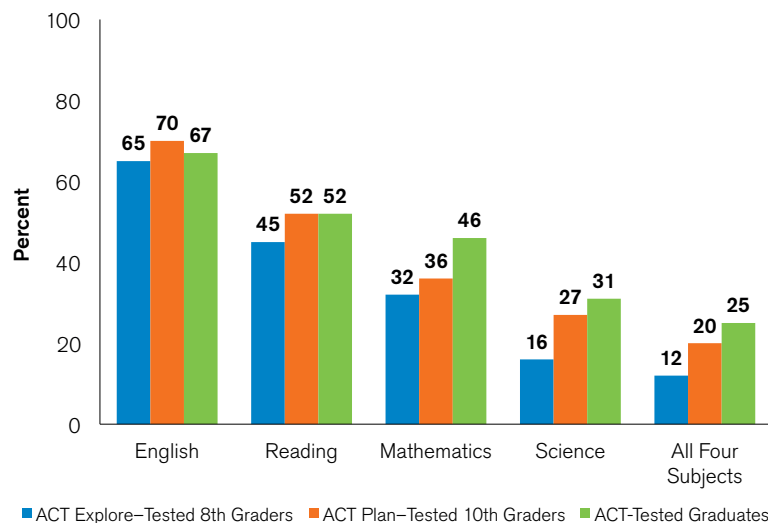
Percent of ACT Plan–Tested 10th Graders Meeting ACT Plan Benchmarks by Subject, 2012



Progress Toward College Readiness

ACT College Readiness Benchmarks—On Target and Attained

Percent of 2011–2012 ACT Explore–Tested 8th Graders, 2011–2012 ACT Plan–Tested 10th Graders, and 2012 ACT–Tested Graduates Meeting ACT College Readiness Benchmarks, 2012



For all subjects, the percentages of 10th graders meeting the ACT College Readiness Benchmarks were higher than the corresponding percentages of 8th graders. With the exception of English, the percentages of high school graduates meeting the Benchmarks were equal to or higher than the corresponding percentages of 10th graders.

A quarter of 2012 ACT-tested graduates met all four ACT College Readiness Benchmarks, while only 20% of 2011–12 ACT Plan–tested 10th graders and 12% of 2011–12

ACT Explore–tested 8th graders did so. Across grade levels, only the English Benchmark was met by more than 50% of all tested students regardless of grade.

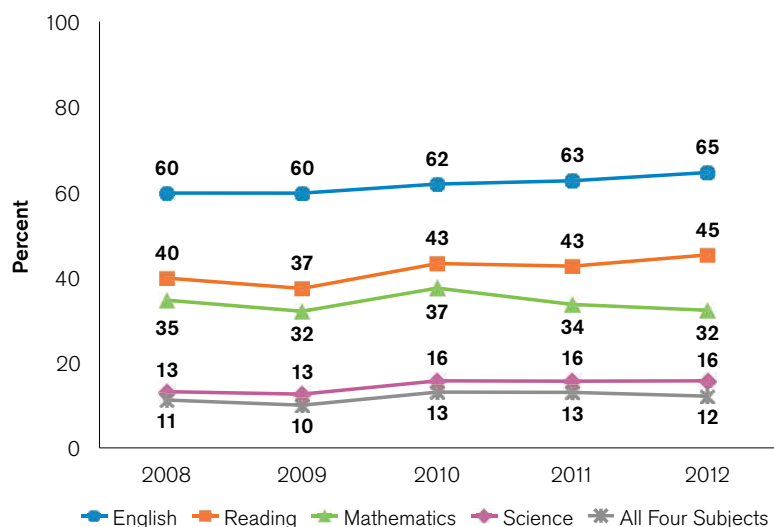
Note: Data represented in the above figure are cross-sectional and not longitudinal, reflecting three different groups of students.

Progress Toward College Readiness

ACT Explore Benchmarks Over Time

Between 2008 and 2012, ACT Explore College Readiness Benchmark attainment percentages remained relatively stable, increasing slightly in English, Reading, and Science. In English, the percentage of ACT Explore–tested 8th graders increased from 60% to 65%; the percentages meeting the Benchmarks increased from 40% to 45% in Reading and from 13% to 16% in Science. Slightly higher percentages of students met the Mathematics Benchmark in 2008 (35%) than in 2012 (32%).

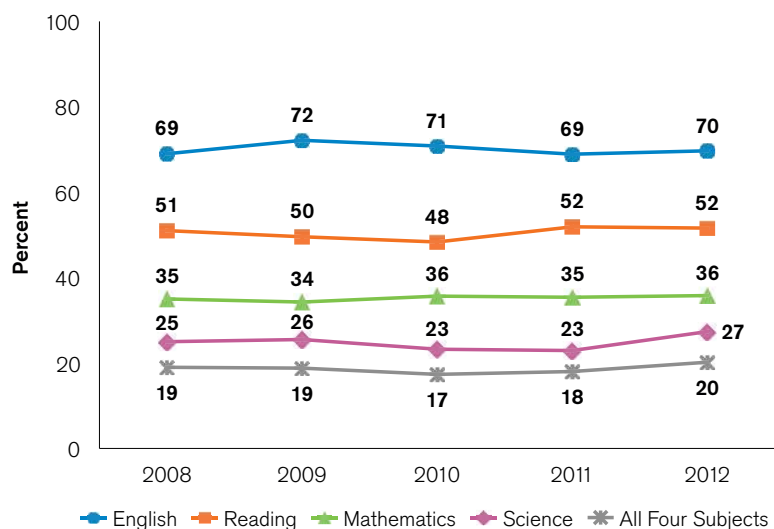
Percent of ACT Explore–Tested 8th Graders Meeting ACT Explore Benchmarks, 2008–2012



ACT Plan Benchmarks Over Time

Between 2008 and 2012, ACT Plan Benchmark attainment percentages remained relatively stable, with no notable increases or decreases in any subject.

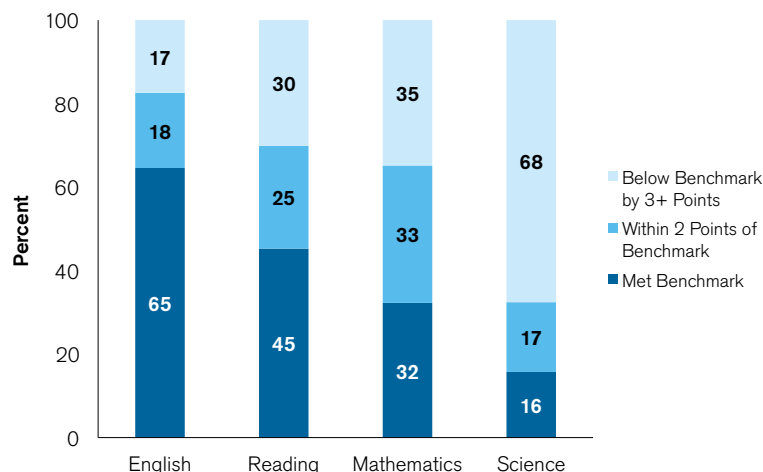
Percent of ACT Plan–Tested 10th Graders Meeting ACT Plan Benchmarks, 2008–2012



Progress Toward College Readiness

ACT Explore Benchmarks—Attainment and Near Attainment

Percent of ACT Explore–Tested 8th Graders by Benchmark Attainment and Subject, 2012

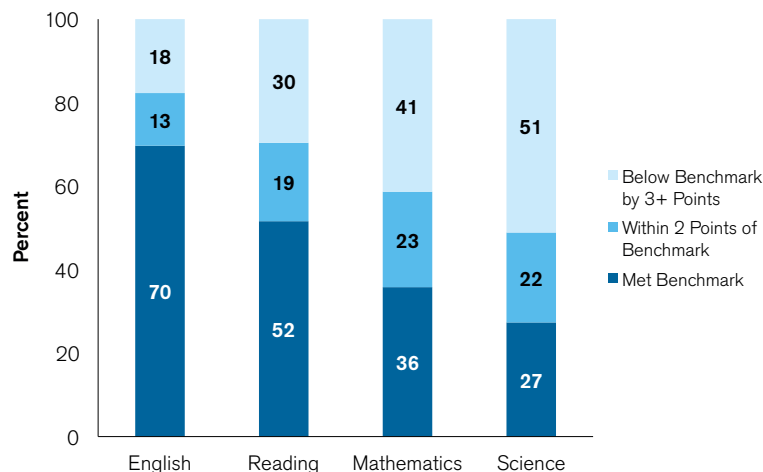


About 17% to 33% of ACT Explore–tested 8th graders were within two scale points of meeting an ACT Explore College Readiness Benchmark in 2012, depending on subject area. This represents approximately 157,000 to 305,000 additional students who were close to being on track to college readiness within a subject area.

In 2012, 65% of ACT Explore–tested 8th graders met the English Benchmark, while another 18% were within two scale points of doing so. The percentages of students within two scale points of the ACT Explore College Readiness Benchmarks were even more impressive in Reading and Mathematics, including 25% of the students in Reading, and 33% of the students in Mathematics.

ACT Plan Benchmarks—Attainment and Near Attainment

Percent of ACT Plan–Tested 10th Graders by Benchmark Attainment and Subject, 2012



About 13% to 23% of ACT Plan–tested 10th graders were within two scale points of meeting an ACT Plan College Readiness Benchmark in 2012, depending on subject area. This represents approximately 162,000 to 287,000 additional students who were close to being on track to college readiness within a subject area.

In 2012, 70% of ACT Plan–tested 10th graders met the English Benchmark, while another 13% were within two scale points of doing so. The percentages of students within two scale points of the respective Benchmark in the other subject areas were the same or greater, including 19% in Reading, 23% in Mathematics, and 22% in Science.

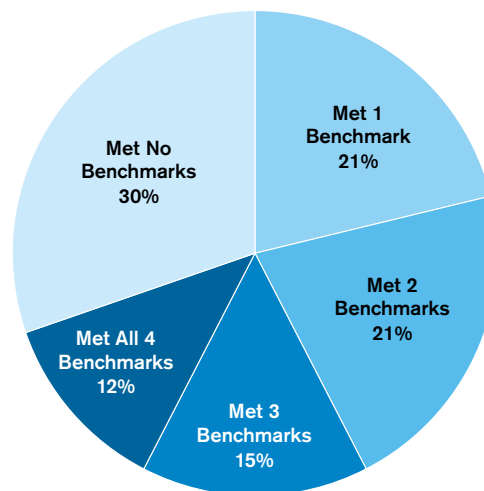
Note: Percents in this report may not sum to 100% due to rounding.

Progress Toward College Readiness

Number of ACT Explore Benchmarks Attained

About 70% of ACT Explore–tested 8th graders met at least one of the four ACT Explore College Readiness Benchmarks in English, Reading, Mathematics, or Science. Thirty percent of the students did not meet any of the benchmarks, and about 57% of the students met between one and three Benchmarks. Only 12% met all four of the Benchmarks, meaning that only about one in eight ACT Explore–tested 8th graders were academically on track for college readiness in all four subject areas.

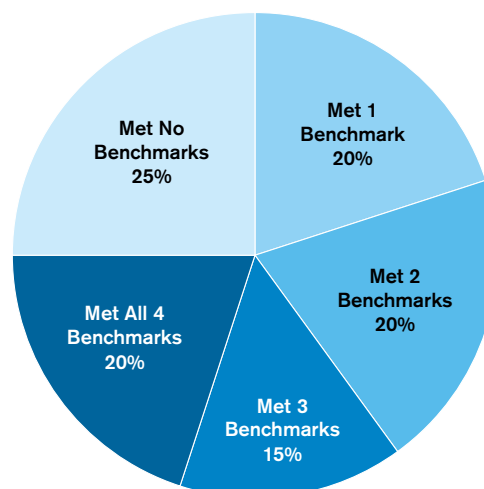
Percent of ACT Explore–Tested 8th Graders by Number of Benchmarks Attained, 2012



Number of ACT Plan Benchmarks Attained

About 75% of ACT Plan–tested 10th graders met at least one of the four ACT Explore College Readiness Benchmarks in English, Reading, Mathematics, or Science. Twenty-five percent of the students did not meet any of the benchmarks, and about 55% of the students met between one and three Benchmarks. Only 20% met all four of the Benchmarks, meaning that one in five ACT Plan–tested 10th graders were academically on track for college readiness.

Percent of ACT Plan–Tested 10th Graders by Number of Benchmarks Attained, 2012

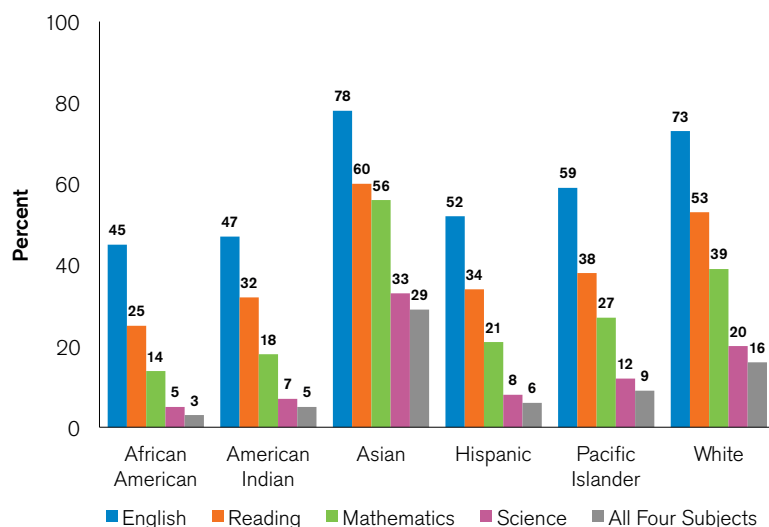


Note: Percents in this report may not sum to 100% due to rounding.

Progress Toward College Readiness

ACT Explore Benchmarks by Race/Ethnicity

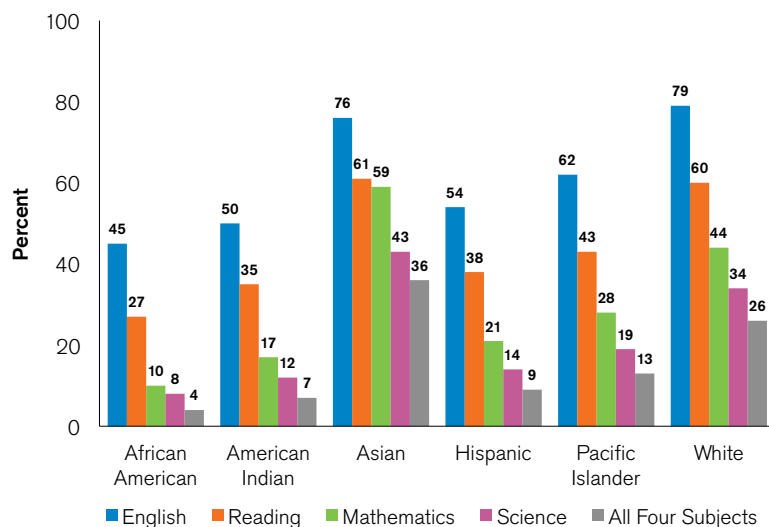
Percent of ACT Explore–Tested 8th Graders Meeting Benchmarks by Race/Ethnicity, 2012



Nearly three in 10 (29%) of ACT Explore–tested Asian 8th graders met all four ACT Explore College Readiness Benchmarks in 2012, more than students from all other racial/ethnic groups. African American students were least likely to meet the Benchmarks; only 3% met all four. The pattern of most students meeting the English Benchmark followed by Reading, Mathematics, and Science held true for all student groups.

ACT Plan Benchmarks by Race/Ethnicity

Percent of ACT Plan–Tested 10th Graders Meeting Benchmarks by Race/Ethnicity, 2012



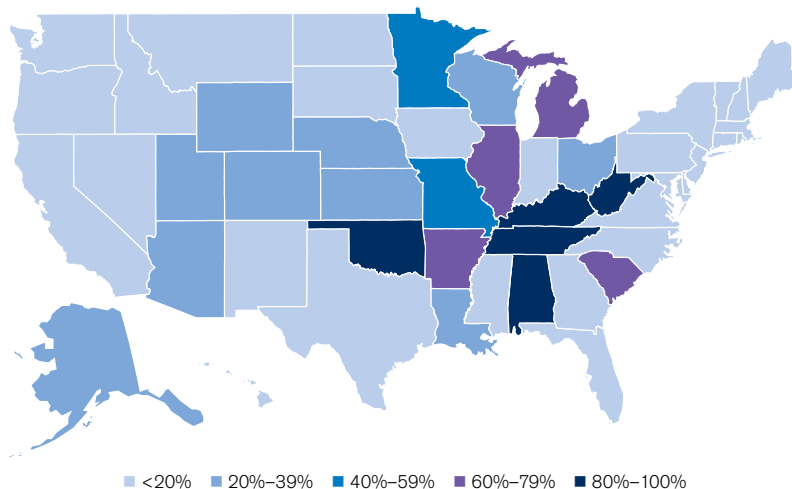
More than one in three (36%) of ACT Plan–tested Asian 10th graders met all four ACT Plan Benchmarks in 2012, more than students from all other racial/ethnic groups. African American students were least likely to meet the Benchmarks; only 4% met all four. The English-Reading-Mathematics-Science pattern held across all groups.

Access

Percent of 8th Graders Who Took ACT Explore by State

At least 60% of all 8th graders took ACT Explore in 2012 in nine states. In five states, at least 80% of 8th-grade students took ACT Explore. In two states, between 40% and 59% of 8th graders took ACT Explore. In two states, between 20% and 39% of 8th graders took ACT Explore. Less than 20% of 8th graders took ACT Explore in 29 states and Washington, DC.

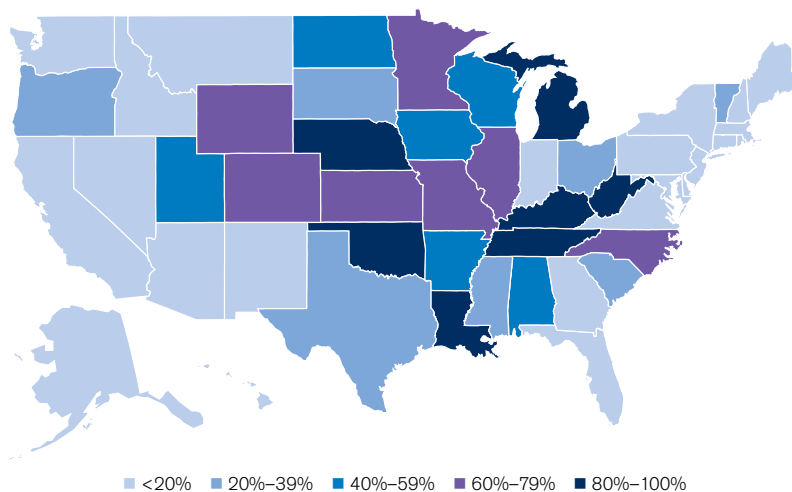
Percent of ACT Explore–Tested 8th Graders by State, 2012



Percent of 10th Graders Who Took ACT Plan by State

At least 60% of all 10th graders took ACT Plan in 2012 in 14 states. In seven states, at least 80% of 10th-grade students took ACT Plan. In six states, between 40% and 59% of 10th graders took ACT Plan in 2012, while another seven states saw between 20% and 39% of their 10th graders take ACT Plan. Less than 20% of 8th graders took ACT Plan in 23 states and Washington, DC.

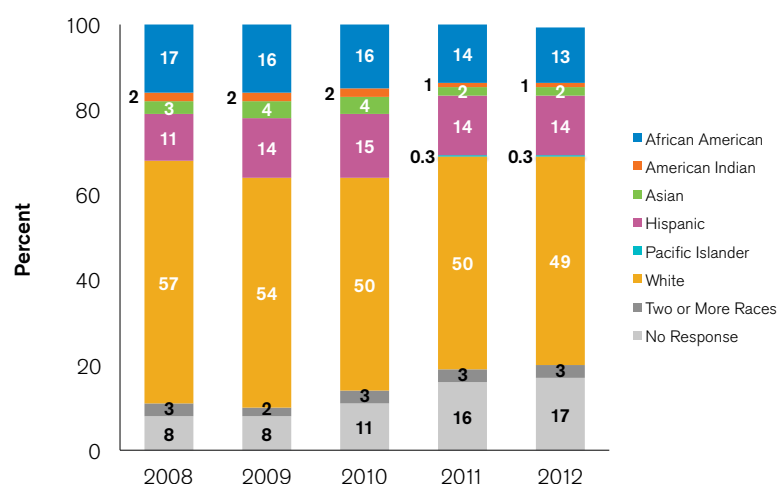
Percent of ACT Plan–Tested 10th Graders by State, 2012



Access

Number of 8th Graders Who Took ACT Explore by Race/Ethnicity

Percentage of ACT Explore–Tested 8th Graders by Race/Ethnicity, 2008–2012



The number of 8th-grade students taking ACT Explore increased by 49% between 2008 and 2012.

During that time, the demographic makeup of the students changed; in 2008, 57% of ACT Explore–tested 8th graders were White, whereas in 2012, White students made up fewer than half (49%) of the tested students.

Proportionally, the largest increases were in Hispanic students (94% increase) and students of Two or More Races (50% increase). The number of American Indian students taking ACT Explore declined by 11%.

Number of ACT Explore–Tested 8th Graders by Race/Ethnicity, 2008–2012

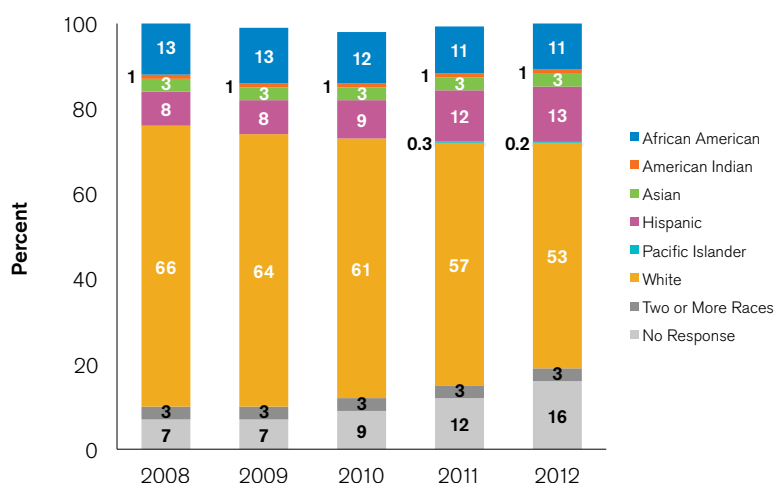
ACT Explore	2008	2009	2010	2011	2012	% Change
African American	107,561	113,964	127,683	122,103	122,710	14%
American Indian	11,404	11,292	12,148	9,544	10,184	-11%
Asian	16,579	24,639	30,751	18,983	20,406	23%
Hispanic	66,957	96,572	119,491	122,776	130,123	94%
Pacific Islander				2,336	2,343	
White	351,823	371,649	388,816	425,618	453,307	29%
Two or More Races	17,258	17,043	19,734	22,537	25,861	50%
No Response	50,407	58,159	85,293	133,747	160,196	218%
Total	621,989	693,318	783,916	857,644	925,130	49%

Access

Number of 10th Graders Who Took ACT Plan by Race/Ethnicity

The number of 10th-grade students taking ACT Plan increased by 26% between 2008 and 2012. During that time, there were some changes to the demographic makeup of students tested. Proportionally, the largest increases were in Hispanic students (111% increase) and students of Two or More Races (55% increase). The number of American Indian students taking ACT Plan declined by 16%.

Percentage of ACT Plan–Tested 10th Graders by Race/Ethnicity, 2008–2012



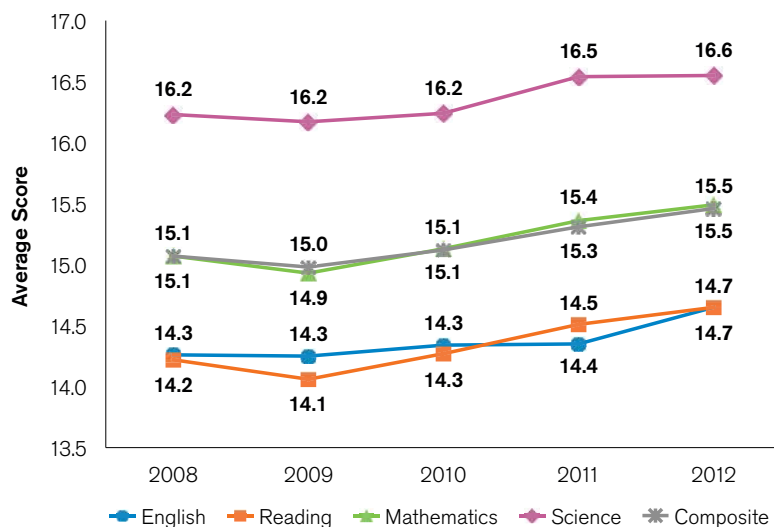
Number of ACT Plan–Tested 10th Graders by Race/Ethnicity, 2008–2012

ACT Plan	2008	2009	2010	2011	2012	% Change
African American	126,492	132,210	128,360	129,026	137,669	9%
American Indian	13,165	14,537	14,945	10,714	11,074	-16%
Asian	28,791	34,418	36,022	30,996	35,780	24%
Hispanic	75,343	86,566	95,982	137,410	158,919	111%
Pacific Islander				3,373	2,866	
White	650,432	654,353	632,821	645,694	666,219	2%
Two or More Races	25,177	26,127	27,384	33,922	39,092	55%
No Response	71,538	73,254	94,404	136,740	197,585	176%
Total	990,938	1,021,465	1,029,918	1,127,875	1,249,204	26%

Academic Performance

ACT Explore Scores Over Time

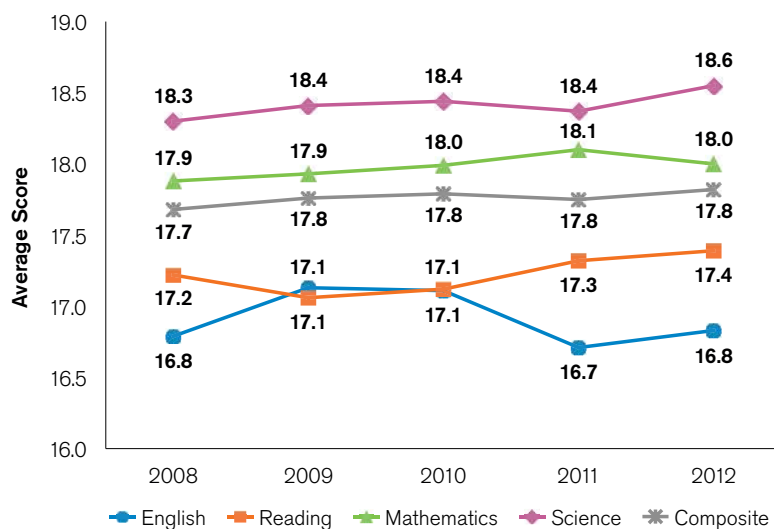
Average ACT Explore Scores, 2008–2012



ACT Explore scores increased slightly between 2008 and 2012 by about 0.4 point in each subject area. The average Composite score increased from 15.1 to 15.5.

ACT Plan Scores Over Time

Average ACT Plan Scores, 2008–2012



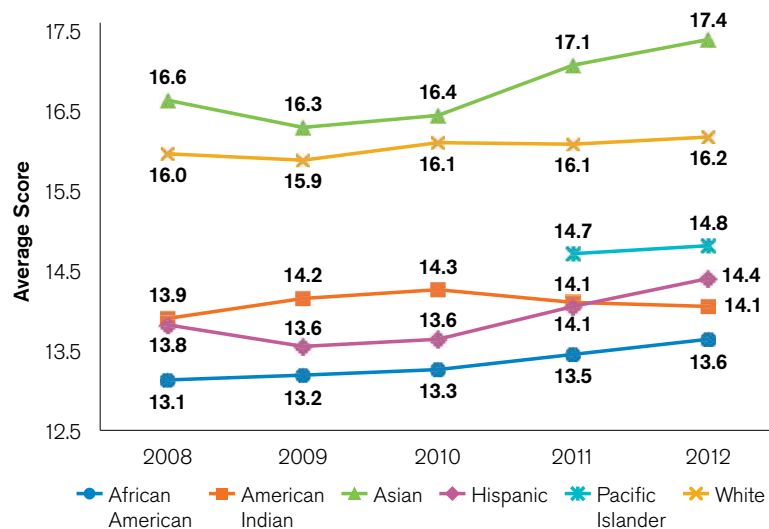
ACT Plan scores remained essentially the same between 2008 and 2012. A slight increase was seen in Science scores from 18.3 in 2008 to 18.6 in 2012, while the Composite score ranged between 17.7 and 17.8.

Academic Performance

ACT Explore Scores Over Time by Race/Ethnicity

Average ACT Explore Composite scores of Asian, Hispanic, and African American students increased by more than half a score point between 2008 and 2012. Scores of American Indian and White students remained essentially the same, increasing by 0.2 points.

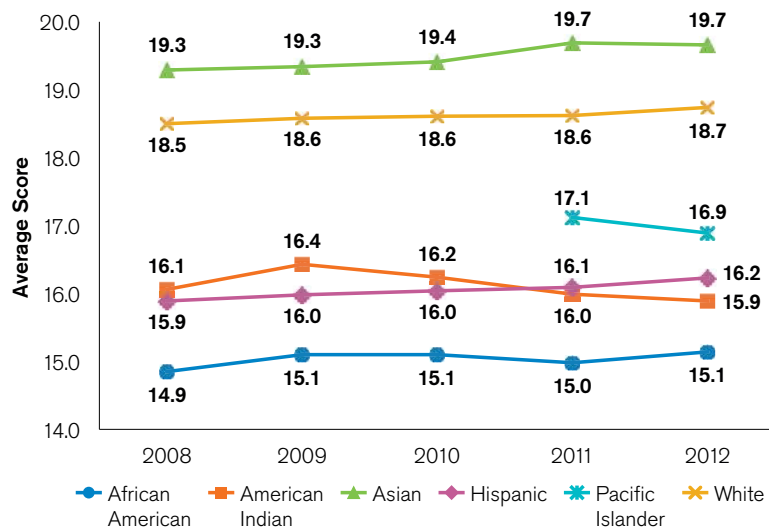
Average ACT Explore Composite Test Scores by Race/Ethnicity, 2008–2012



ACT Plan Scores Over Time by Race/Ethnicity

Average ACT Plan Composite scores increased slightly between 2008 and 2012 for Asian students, from 19.3 to 19.7. Scores of students in other race/ethnicity categories remained essentially the same.

Average ACT Plan Composite Test Scores by Race/Ethnicity, 2008–2012



Policy and Practice Recommendations for Increasing Readiness

The ACT report *The Forgotten Middle*³ reported that the level of academic achievement attained by the 8th grade, as measured by ACT Explore scores, influences eventual college and career readiness more than any academic factors during the high school years. If students are not on target for college and career readiness before high school, it will be very difficult, if not impossible, for them to catch up and become college ready by the end of high school. This is why it is imperative to look at academic readiness early, long before students get to high school.

Only 12% of 8th graders who took ACT Explore during the 2011–12 school year met all four of the ACT College Readiness Benchmarks, and 30% met no Benchmarks. Students who took ACT Plan showed slightly better progress toward college readiness by 10th grade, with 20% meeting or exceeding all four Benchmarks on ACT Plan. However, a quarter (25%) of 10th graders who took ACT Plan in 2011–12 met no Benchmarks, leaving little time before graduation to prepare for rigorous college-level work. In order to increase the number of students on track for college readiness, states and districts should consider implementing the following policies and practices, with an emphasis on instilling a culture of college readiness throughout the K–12 system:

- **High Academic Expectations for All Students.** ACT has long advocated for the adoption of rigorous academic standards designed to prepare all students for the challenges of a variety of postsecondary education settings. While the majority of states have taken this step by adopting the Common Core State Standards, all states should ensure that their college and career

readiness standards are aligned to a rigorous curriculum in not only the high school grades, but also during middle school and earlier. Curriculum in the upper elementary grades and middle school should focus on preparing students for rigorous high school expectations and on teaching them the foundational skills necessary to progress toward college and career readiness. These skills should be taught to *all* students, not just those perceived as having a better chance of attaining college readiness before high school graduation.

- **Rigorous Course Content Aligned to Readiness.** The 2012 ACT National Curriculum Survey[®] reported a large gap between high school teachers' perceptions of their graduating students' college readiness and college instructors' perceptions of the readiness of their first-year students. The report states that this may be “due at least in part to a lack of alignment between K–12 and postsecondary curricula,” which could be affecting students' ability to become prepared for college-level work.⁴ Implementing more rigorous academic standards, like the Common Core State Standards, in the middle and high school grades and aligning curricula to college readiness are critical to closing this perceived readiness “gap” in college-bound students, but schools and districts must also do more to prepare teachers to teach rigorous course content. Not all schools and teachers are prepared to teach the content associated with new, more rigorous college and career readiness standards, and school and district administrators must support teachers by providing the training and materials necessary to ensure that teachers are well equipped to implement the improved

³ ACT, *The Forgotten Middle: Ensuring that All Students Are on Target for College and Career Readiness before High School* (Iowa City, IA: Author, 2008).

⁴ ACT, *ACT National Curriculum Survey 2012: Policy Implications on Preparing for Higher Standards* (Iowa City, IA: Author, 2013), 12.

standards as intended. Development of K–12 instructional practice, particularly in the middle and high school grades, is critical to support teachers and elevate course content and teaching to the levels that will prepare students for postsecondary-level coursework.

- **Early, Consistent Monitoring of Progress Toward Readiness.** College and career readiness does not happen overnight during the high school years. In fact, past research has shown that students who are off track academically in middle school have a limited chance of becoming college ready before graduation.⁵ Because of this, it is critical to begin monitoring development of foundational skills beginning in the elementary grades. Longitudinal data systems enable identification of deficiencies that are occurring during the early years, and they will allow teachers and administrators to monitor a student's progress toward college and career readiness as he or she moves through the K–12 system to high school graduation.
- **Early Implementation of Interventions.** As previously noted, early identification of deficiencies in foundational skills is a key step in improving college readiness rates. It is just as important to implement high-quality academic interventions as soon as a deficiency is identified to give a student the best chance of catching up. These interventions should be demonstrated to be effective by rigorous scientific research, and any interventions used should be monitored to ensure

that they are having positive effects for each individual student. Intervention alone will not solve the problem of being off track for college readiness, but it is a critical part of ensuring that students will have the knowledge and skills they need to be ready for college-level work before they graduate from high school.

- **Use of Data-Based Decision Making.** States should continue to develop the capacity among teachers and administrators to effectively use and act on information generated by their statewide longitudinal P–16 data systems. All states currently have “robust statewide longitudinal data systems,” according to the Data Quality Campaign.⁶ Use of these longitudinal data systems will allow schools and districts to monitor student performance and, eventually, readiness for postsecondary education and career throughout a child's P–12 school years and beyond. The data collected through such systems enable administrators and educators to identify students in need of academic interventions at the earliest age possible. This early identification of academic needs and subsequent monitoring of progress through data will give students a better chance of improving achievement and skills before high school graduation. States and districts should also provide adequate preparation and professional development for teachers and administrators in the appropriate use of longitudinal data for planning instruction and interventions.

⁵ ACT, *College and Career Readiness: The Importance of Early Learning* (Iowa City, IA: Author, 2013).

⁶ Data Quality Campaign, *Data for Action 2012: Focus on People to Change Data Culture* (Washington, DC: Author, November 2012), www.dataqualitycampaign.org/your-states-progress/executive-summary/.

Notes

ACT College Readiness Benchmarks

The ACT College Readiness Benchmarks are the minimum ACT scores required for students to have a high probability of success in credit-bearing college courses—English Composition, social sciences, College Algebra, or Biology. In addition to the Benchmarks for the ACT, there are corresponding Benchmarks for ACT Explore, taken in 8th and/or 9th grades, and ACT Plan, taken in 10th grade, to gauge student progress in becoming ready for college.

The ACT College Readiness Benchmarks for ACT Explore and ACT Plan were developed using about 150,000 records of students who had taken ACT Explore, ACT Plan, and the ACT. First, we estimated the probabilities at each ACT Explore and ACT Plan test score point associated with meeting the appropriate Benchmark for the ACT. We then identified the ACT Explore and ACT Plan test scores in English, Reading, Mathematics, and Science that corresponded most closely to a 50 percent probability of success at meeting each of the four Benchmarks established for the ACT.

ACT College Readiness Benchmarks⁷

College Course or Course Area	ACT Subject-Area Test	ACT Explore Benchmark Grade 8	ACT Explore Benchmark Grade 9	ACT Plan Benchmark	ACT Benchmark
English Composition	English	13	14	15	18
Social Sciences	Reading	15	16	17	21
College Algebra	Mathematics	17	18	19	22
Biology	Science	20	20	21	24

⁷ ACT introduced updated ACT College Readiness Benchmarks in August 2013. The 2013 Benchmarks differ from the Benchmarks used in this report and presented on this page. For more information, please see www.act.org/research/policymakers/pdf/benchmarks.pdf.

ACT is an independent, nonprofit organization that provides assessment, research, information, and program management services in the broad areas of education and workforce development. Each year, we serve millions of people in high schools, colleges, professional associations, businesses, and government agencies, nationally and internationally. Though designed to meet a wide array of needs, all ACT programs and services have one guiding purpose—helping people achieve education and workplace success.

This report can be found online at
www.act.org/buildingmomentum

