

## The Condition of College & Career Readiness 2015

The Condition of College & Career Readiness 2015 is the ACT annual report on the progress of US high school graduates relative to college readiness. This year's report shows that 59% of students in the 2015 US graduating class took the ACT® test, up from 57% last year and 49% in 2011. The increased number of test takers over the past several years enhances the breadth and depth of the data pool, providing a comprehensive picture of the current graduating class in the context of college readiness as well as offering a glimpse at the emerging educational pipeline.

#### The ACT: Now More Than Ever

ACT has a longstanding commitment to improving college and career readiness. Through our research, our thought leadership, and our solutions, we seek to raise awareness of issues and best practices aimed at helping individuals achieve education and workplace success. As the landscape of education and assessment rapidly shifts and state education and economic development agendas converge, ACT is uniquely positioned to inform decisions at the individual, institutional, system, and agency levels.

As a research-based nonprofit organization, ACT is committed to providing information and solutions to support the following:

- Holistic View of Readiness. Our research shows that the ACT College and Career Readiness Standards can help prepare students for college and career success. However, we understand that academic readiness is just one of several factors that contribute to educational success. One 2014 ACT report, Broadening the Definition of College and Career Readiness: A Holistic Approach, shows academic readiness-long the sole focus of monitoring college readiness—as one of four critical domains in determining an individual's readiness for success in college and career. Crosscutting skills, behavioral skills, and the ability to navigate future pathways are also important factors to measure and address. Together, these elements define a clear picture of student readiness for postsecondary education. To encourage progress, the educational system needs to monitor and sustain all key factors of success.
- Stability and Validity of Data. ACT is committed to
  maintaining the integrity and credibility of the 1–36 score
  scale, a scale that is familiar to and valued by the many
  stakeholders served by ACT. Leveraging the power of
  longitudinal data means avoiding dramatic shifts in the
  reporting structure.
- Promoting Access. Serving the needs of our many stakeholders is a focal point for ACT. We will continue to explore ways to expand college access for all students, promoting initiatives to better meet the needs of underserved learners and developing solutions and

services that make a difference in the lives of those we serve. Through new avenues such as online testing, initiating campaigns targeted at underserved students, and supporting organizations aligned with our mission, ACT is working to reach and help a greater number of individuals

- Radical Change. ACT is committed to providing a wider range of solutions, across a broader span of life's decision points, in an increasingly individualized manner so that all can benefit. This has led us to a mode of continuous improvement. However, our goal is to avoid radical change so as to assist our users with transition. Our research agenda takes into account the changes in education and workplace practice and the demographics and evolving needs of those we serve. Accordingly, when research and evidence dictate, we will continue to make necessary changes in our recommendations and/or solutions, including discontinuing outdated programs and services, to bring clarity to the market.
- Providing Meaningful Data for Better Decisions. ACT
  is focused on providing better data to students, parents,
  schools, districts, and states so that all can make more
  informed decisions to improve outcomes. We accomplish
  this goal by taking a holistic view and using consistent
  and reliable historical information, so that individuals and
  institutions have a better context to make critical
  decisions about the journey they have undertaken.

### Using This Report<sup>1</sup>

This report is designed to help educators understand and answer the following questions:

- Are your students graduating from high school prepared for college and career?
- Are enough of your students taking core courses necessary to be prepared for success, and are those courses rigorous enough?
- What are the most popular majors/occupations, and what does the pipeline for each look like?
- What other dimensions of college and career readiness, outside of academic readiness, should educators measure and track?

We sincerely hope this report will serve as a call to action—or even as a wake-up call—that our nation's current policies and practices are not having the desired effect of increasing the college and career readiness levels of US high school graduates. We remain committed to providing more and better data so individuals and institutions can make better-informed decisions leading to the improved educational outcomes we all desire and help more individuals achieve education and workplace success.

# **Key Findings**

### **Montana**

### About Your Graduating Class

In Montana, there were 9,489 students in the 2015 graduating class who took the ACT. This represents an estimated 100% of the 2015 Montana graduating class being tested with the ACT. Montana saw an increase in ACT-tested graduates of 57% since 2011. Nationally, 1,924,436 students (an estimated 59% of the graduating class) were ACT tested, representing an increase in ACT-tested graduates of 19% since 2011.

Montana tested at least 90% of its graduates. As a result, this report represents a significant portion of the student population. This also means Montana tested more than just a college-bound population, which ACT research has shown to be associated with lower overall academic achievement levels. Caucasian ACT-tested graduates reflected a smaller percentage of students than in the 2011 ACT-tested graduating class. Montana's ACT-tested graduating class had 17% potential first-generation students, or students whose parents did not enroll in postsecondary education. This compares to 18% of ACT-tested graduates nationwide.

#### Academic Achievement

Opportunities for building student college readiness can be found in English, reading, math, and science. In interpreting academic achievement trend data, it is important to remember that in 2013, the ACT College Readiness Benchmark in science decreased from 24 to 23, and the ACT College Readiness Benchmark in reading increased from 21 to 22. During the routine practice of monitoring predictive validity, ACT analyzes the performance of students in college, focusing on what is happening to students in the credit-bearing first-year college course in each specific content area. Data gathered through this routine review indicated a need to make updates to the ACT College Readiness Benchmarks.

### Opportunity for Growth

Montana has an opportunity to improve on the college and career readiness of its students, especially in English, reading, and science, where at least 10% of the students were only 1 or 2 points below the Benchmark. ACT research has shown those students meeting three or four ACT College Readiness Benchmarks are likely to be successful in postsecondary education. For Montana, this means that the 37% who met three or four ACT College Readiness Benchmarks have a strong likelihood of experiencing success in college. A great way to improve student college and career readiness is to get more of them to take a college preparatory core curriculum. In fact, Montana saw 58% of core-taking students meeting the math ACT College

Readiness Benchmark, compared to 24% of non-core-taking students meeting the Benchmark. In this graduating class, 42% of Montana's ACT-tested graduates reported they did not plan to take a core curriculum, which means that 4,002 more students could have benefited from more rigorous coursework, presenting a real opportunity for improvement in college and career readiness.

### Student Aspirations

There is good news in that 83% of Montana's 2015 ACTtested graduates aspired to postsecondary education. Interestingly enough, 87% of Montana's 2014 ACT-tested graduating class aspired to enroll in postsecondary education, compared to 50% who actually did enroll. If we fully closed the aspirational gap, an additional 3,570 of the 2014 ACT-tested graduates from Montana would have enrolled in postsecondary education.

### What Affects Student Success?

ACT research (Broadening the Definition of College and Career Readiness: A Holistic Approach, 2014; Beyond Academics: A Holistic Framework for Enhancing Education and Workplace Success, 2015) demonstrates that while academically prepared students, as measured by the ACT College Readiness Benchmarks, are more likely than less-prepared students to succeed in their future educational endeavors, there are other factors that impact student success. They fall into four domains:

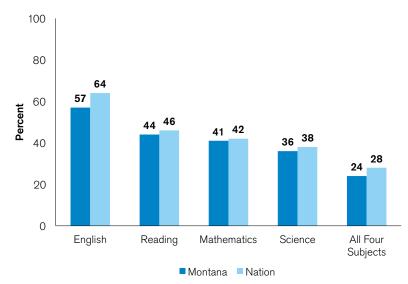
- Core academic skills include the domain-specific knowledge and skills necessary to perform essential tasks in the core academic content areas of English language arts, mathematics, and science.
- **Crosscutting capabilities** include the general knowledge and skills necessary to perform essential tasks across academic content areas. This includes technology and information literacy, collaborative problem solving, thinking and metacognition, and studying and
- Behavioral skills include interpersonal, self-regulatory, and task-related behaviors important for adaptation to and successful performance in educational and workplace settings.
- Education and career navigation skills include the personal characteristics, processes, and knowledge that influence individuals as they navigate their educational and career paths (e.g., make informed, personally relevant decisions; develop actionable, achievable plans).



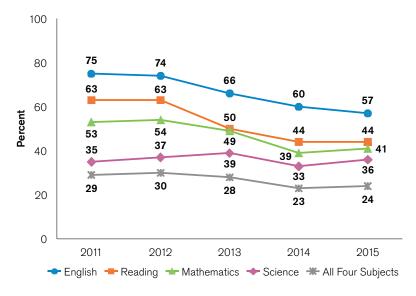
## **Attainment of College and Career Readiness**

- 9,489 of your graduates, which is an estimated 100% of your graduating class, took the ACT\*
- From 2011–2015, the number of ACT test-taking graduates has increased by 57.2%, while the estimated number of graduates in your state has decreased by 10.1%.

## Percent of 2015 ACT-Tested High School Graduates Meeting ACT College Readiness Benchmarks by Subject



## Percent of 2011–2015 ACT-Tested High School Graduates Meeting ACT College Readiness Benchmarks\*\*



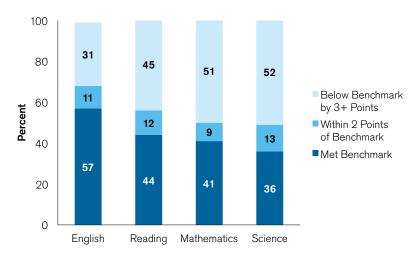
<sup>\*\*</sup>ACT College Readiness Benchmarks in reading and science were revised in 2013. See page 19 for details.

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

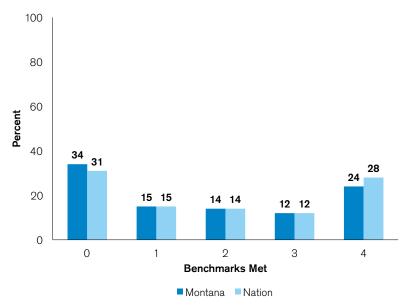
<sup>\*</sup> Totals for graduating seniors were obtained from *Knocking at the College Door: Projections of High School Graduates*, 8th edition.
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## **Near Attainment of College and Career Readiness**

Percent of 2015 ACT-Tested High School Graduates by **ACT College Readiness Benchmark Attainment and Subject** 



### Percent of 2015 ACT-Tested High School Graduates by Number of ACT College Readiness Benchmarks Attained





## **Participation and Opportunity**

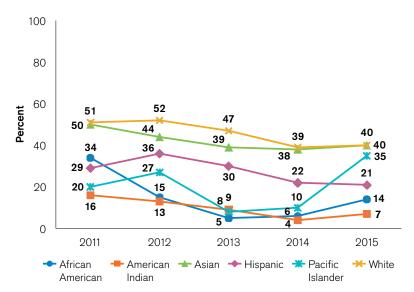
Over the past decade, ACT has experienced unprecedented growth in the number of students tested, as well as statewide partnerships in 14 states and in many districts across the country. As a result, the 2015 Condition of College & Career Readiness report provides a much deeper and more representative sample in comparison to a purely self-selected college-going population.

## Percent of 2011–2015 ACT-Tested High School Graduates by Race/Ethnicity\*



Note: Values less than 0.5% will not appear.

## Percent of 2011–2015 ACT-Tested High School Graduates Meeting Three or More Benchmarks by Race/Ethnicity\*

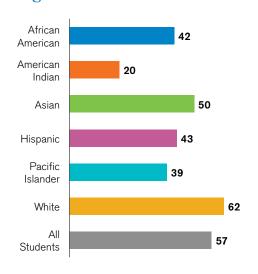


<sup>\*</sup> Race/ethnicity categories changed in 2011 to reflect updated US Department of Education reporting requirements.<sup>2</sup>

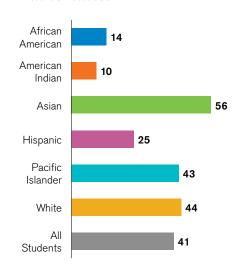
## **Participation and Opportunity by Subject**

Percent of 2015 ACT-Tested High School Graduates Meeting ACT College Readiness Benchmarks by Race/Ethnicity and Subject\*

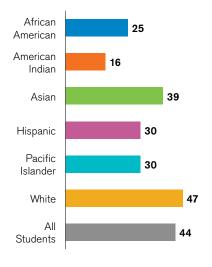
### English



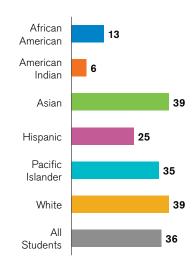
#### **Mathematics**



## Reading



#### Science



African American	American Indian	Asian	Hispanic	Pacific Islander	White	All Students
N = 69	N = 447	N = 62	N = 481	N = 23	N = 7.149	N = 9.489

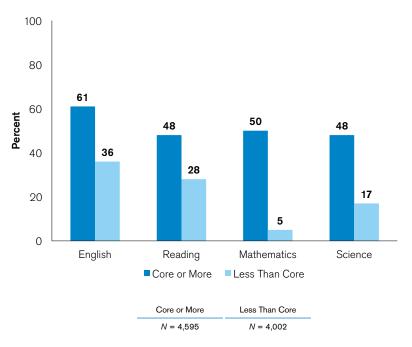
<sup>\*</sup> Race/ethnicity categories changed in 2011 to reflect updated US Department of Education reporting requirements.2



## **Course-Taking Patterns and Benchmark Performance**

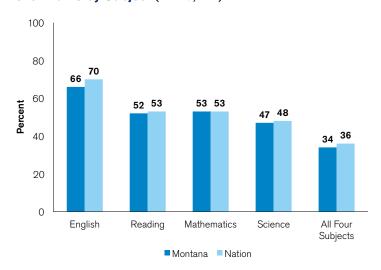
Within subjects, ACT has consistently found that students who take the recommended core curriculum are more likely to be ready for college or career than those who do not. A core curriculum is defined as four years of English and three years each of mathematics, social studies, and science.<sup>3</sup>

Percent of 2015 ACT-Tested High School Graduates in Core or More vs. Less Than Core Courses Meeting ACT College Readiness Benchmarks by Subject



## A Look at STEM

Percent of 2015 ACT-Tested High School Graduates with an Interest in STEM Meeting ACT College Readiness Benchmarks by Subject (*N* = 3,244)

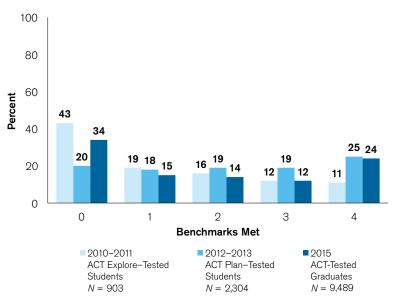


This chart compares ACT College Readiness Benchmark attainment for 2015 high school graduates in your state who have an interest in STEM majors or occupations to STEM-interested graduates nationally. Characteristics of students with an interest in STEM were addressed in greater depth in the *Condition of STEM 2014* report.

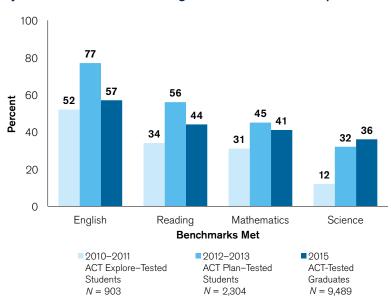
## **Early Preparation**

ACT research shows that younger students who take rigorous curricula are more prepared to graduate from high school ready for college or career. Moreover, our research (The Forgotten Middle, 2008) found that "the level of academic achievement that students attain by 8th grade has a larger impact on their college and career readiness by the time they graduate from high school than anything that happens academically in high school."

### Percent of Students Meeting ACT College Readiness Benchmarks at Three Stages of Academic Development



Percent of Students Meeting ACT College Readiness Benchmarks by Content Area at Three Stages of Academic Development



In past Condition reports, ACT Explore®, ACT Plan®, and ACT results all reflected data from students testing or graduating in the current year. This year, ACT Explore and ACT Plan results reflect 2015 graduating class examinees (both tested and not tested with the ACT) when they were assessed in 8th and 10th grades. The goal of this change is to describe the condition of college and career readiness for this year's graduates and their counterparts as they progressed from 8th grade to 10th grade and through graduation.



# **ACT College Readiness Benchmark Attainment** for Top Planned College Majors: 2015 Graduates

When students register for the ACT, they can select a college major—from a list of 294 majors—that they plan to pursue in college. Among recent ACT-tested high school graduates nationwide, about 80% selected a specific planned major, whereas about 20% indicated that they were undecided or did not select a major.

This table ranks the state's top (most frequently selected) majors among 2015 graduates. The percentages of students meeting the ACT College Readiness Benchmarks are shown for each major. Across these planned majors, there are considerable differences in the percentage of students who are ready to succeed in college.

Major Name	N	English	Reading	Math	Science	All Four
No Major Indicated	1,298	37	25	24	19	11
Undecided	922	63	49	42	39	27
Nursing, Registered (BS/RN)	352	57	43	32	29	16
Medicine (Pre-Medicine)	302	84	71	73	66	54
Business Administration and Management, General	231	65	50	46	39	26
Engineering (Pre-Engineering), General	215	73	60	73	61	48
Mechanical Engineering	152	61	41	56	47	34
Elementary Education	118	64	42	42	32	23
Biology, General	117	80	69	59	57	48
Physical Therapy (Pre-Physical Therapy)	114	63	50	46	37	26
Welding Technology	107	24	9	15	11	4
Criminology	105	60	45	28	28	18
Psychology, Clinical and Counseling	101	73	52	43	44	33
Therapy and Rehabilitation, General	101	57	40	40	32	20
Athletic Training	100	55	37	37	38	21
Veterinary Medicine (Pre-Veterinarian)	100	66	55	46	47	30
Art, General	95	47	38	23	22	11
Accounting	90	67	51	56	44	36
Music, General	89	54	47	33	35	22
Pharmacy (Pre-Pharmacy)	84	81	57	68	60	43
Diesel Mechanics/Technology	83	24	12	23	16	1
Social Sciences, General	83	69	58	45	41	31
Teacher Education, General	83	54	41	34	27	16
Photography	82	44	27	17	17	4
Computer Science and Programming	81	73	62	62	58	47
Health-Related Professions and Services, General	78	58	51	47	36	23
Law (Pre-Law)	73	66	44	51	41	27
Graphic Design	72	49	39	36	32	19
Theatre Arts/Drama	70	80	60	31	39	17
Design and Visual Communications, General	69	65	58	38	28	19

Note: *Undecided* and/or *No Major Indicated* are included in the table, if applicable. The former refers to students who selected the option *Undecided* from the list of majors. The latter refers to students who did not respond to the question.

# **ACT College Readiness Benchmark Attainment for the Top Planned College Majors with Good Fit: 2015 Graduates**

Many students gravitate toward majors that align with their preferred activities and values. ACT research has shown that greater *interest-major fit* is related to important student outcomes such as persistence in a major or college. This table shows, for each planned major, the numbers and percentages of students displaying good interest-major fit<sup>4</sup>, as well as the percentages of students meeting the ACT College Readiness Benchmarks. Since only students who completed the ACT Interest Inventory during ACT registration are included here, this table shows results for a subset of the students in the prior table. These planned majors vary considerably in the percentage of students displaying good interest-major fit and meeting the ACT College Readiness Benchmarks. The results highlight the importance of examining multiple predictors of college success and affirm the value of a holistic view of college readiness.

Major Name	N Fit	% Fit	English	Reading	Math	Science	All Four
No Major Indicated				No profile	available		
Undecided				No profile	available		
Nursing, Registered (BS/RN)	117	33	68	54	41	36	22
Medicine (Pre-Medicine)	139	46	91	77	79	71	59
Business Administration and Management, General	70	30	80	61	60	47	31
Engineering (Pre-Engineering), General	85	40	71	59	71	66	51
Mechanical Engineering	66	43	64	48	61	56	39
Elementary Education	18	15	61	50	50	39	39
Biology, General	58	50	86	81	69	67	59
Physical Therapy (Pre-Physical Therapy)	28	25	68	64	54	50	46
Welding Technology	65	61	20	11	17	11	5
Criminology	10	10	80	60	60	60	40
Psychology, Clinical and Counseling	23	23	87	70	52	61	52
Therapy and Rehabilitation, General	14	14	71	64	50	50	43
Athletic Training	12	12	83	50	58	58	33
Veterinary Medicine (Pre-Veterinarian)	40	40	83	73	53	68	48
Art, General	43	45	63	49	30	35	16
Accounting	51	57	69	53	63	47	41
Music, General	48	54	58	52	33	27	21
Pharmacy (Pre-Pharmacy)	34	40	76	62	76	65	47
Diesel Mechanics/Technology	53	64	25	9	28	21	0
Social Sciences, General	19	23	68	63	53	47	47
Teacher Education, General	17	20	76	65	47	35	29
Photography	25	30	68	40	16	28	4
Computer Science and Programming	25	31	72	68	68	64	52
Health-Related Professions and Services, General				No profile	available		
Law (Pre-Law)	23	32	78	52	57	39	30
Graphic Design	41	57	54	37	34	27	12
Theatre Arts/Drama	40	57	83	68	35	43	23
Design and Visual Communications, General	30	43	80	67	40	27	17

Note: *Undecided* and/or *No Major Indicated* are included in the table, if applicable. The former refers to students who selected the option *Undecided* from the list of majors. The latter refers to students who did not respond to the question.



## Other College and Career Readiness Factors

## Aligning Student Behaviors, Planning, and Aspirations

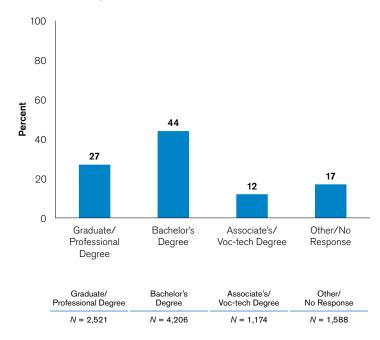
Most students aspire to a post-high school credential. To help them meet those aspirations, educational planning, monitoring, and interventions must be aligned to their aspirations, begin early, and continue throughout their educational careers.

There is good news in that 83% of Montana's 2015 ACT-tested graduates aspired to postsecondary education. Interestingly enough, 87% of Montana's 2014 ACT-tested graduating class aspired to enroll in postsecondary education, compared to 50% who actually did enroll. If we fully closed the aspirational gap, an additional 3,570 of the 2014 ACT-tested graduates from Montana would have enrolled in postsecondary education.

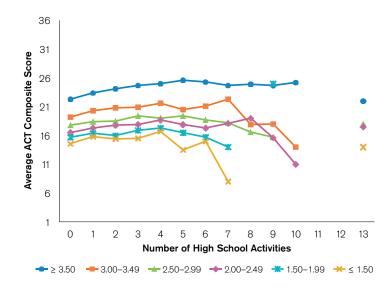
### Activity and Achievement: What's the Connection?

There are wide-ranging benefits to student participation in high school activities. Students can develop new skills, broaden their experiences, practice social skills, and increase their appeal to college admissions personnel. In addition, ACT data indicate that, regardless of a student's high school GPA, involvement in high school activities is often associated with higher ACT Composite scores. At the same time, results typically identify a point of diminishing returns, one where many activities are associated with a drop in ACT scores. The adjacent graph depicts the relationship between ACT scores and the number of high school activities for 2015 graduates in your state.

#### Percent of 2015 ACT-Tested High School Graduates by **Educational Aspirations**



#### Average ACT Composite Score by Number of Activities within High School GPA Ranges for 2015 Graduates

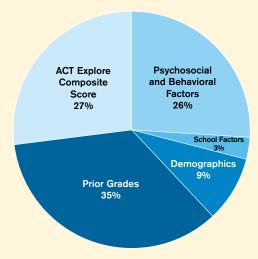


Note: In some cases, high activity counts may represent low numbers of students, giving rise to missing and outlying data points.

## Other College and Career Readiness Factors

## **Early Prediction of High School Outcomes**

#### Relative Importance of Predictors of 12th-Grade Cumulative High School Grade Point Average

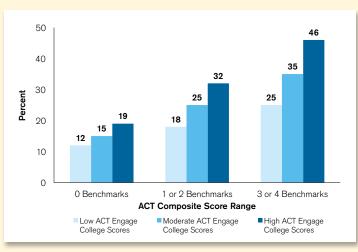


Note: The data used for this analysis came from a longitudinal sample of 3,768 students from 21 schools who took both ACT Explore and ACT Engage Grades 6–9 in 2006, when most students were in 8th grade. Additional waves of data were collected each fall, ending in 2011, when most students should have graduated from high school. The total variance explained in the model was  $R^2 = 0.51$ .

Understanding which student characteristics can predict future performance is essential to early identification and support for students at risk for later academic difficulties. A longitudinal research study found that, in 8th grade, the most important predictor of 12th grade GPA was student grades, followed by academic achievement (measured by ACT Explore) and psychosocial and behavioral factors (measured by ACT Engage® Grades 6-9). Demographics (gender, race/ethnicity, and parent education) and school factors (percent eligible for free/ reduced lunch eligible and percent minority) were less important predictors. These findings underscore the value of using multiple measures, including academic achievement and behaviors, to provide a more holistic approach to assessment that can better assist students in developing the knowledge and skills needed for success.

## **Academic Achievement, Behaviors, and College Completion**

## Percentage Attaining a Postsecondary Degree by ACT and ACT Engage College Scores



Academic behaviors also matter for college outcomes. Across all ACT College Readiness Benchmark levels, students with higher ACT Engage College scores (based on the mean percentile scores of ACT Engage scales Academic Discipline, Commitment to College, and Social Connection) attained a postsecondary degree within four years of college at higher rates than students with lower ACT Engage College scores. For students meeting three or four Benchmarks, those with high ACT Engage College scores attained a timely postsecondary degree at nearly twice the rate as those with low ACT Engage College scores.

Note: Based on a longitudinal sample of 9,446 ACT-tested students from 48 postsecondary institutions who took ACT Engage College during their first semester of college in 2003. Additional waves of data were collected each semester through 2008. Students with a mean percentile score of less than 25 were classified as low, those with scores between 25 and 75 were classified as moderate, and those with scores greater than 75 were classified as high.



## 2015 State Percent of High School Graduates Tested, Average Composite Score, and Percent Meeting Benchmarks by Subject

Alabama         100         19.1         53         34         23         25           Colorado         100         20.7         63         43         40         39           Illinois         100         20.7         63         41         41         37           Kentucky         100         20.0         60         39         32         32           Louisiana         100         19.4         59         35         27         27           Michigan         100         20.1         59         40         34         34           Mississippi         100         19.0         52         31         21         21           Morthana         100         20.4         57         44         41         36           North Carolina         100         20.4         57         44         41         32         26           North Carolina         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         60         40         36         34 </th <th>State</th> <th>Percent of Graduates Tested*</th> <th>Average Composite Score</th> <th>Percent Meeting English Benchmark</th> <th>Percent Meeting Reading Benchmark</th> <th>Percent Meeting Math Benchmark</th> <th>Percent Meeting Science Benchmark</th>	State	Percent of Graduates Tested*	Average Composite Score	Percent Meeting English Benchmark	Percent Meeting Reading Benchmark	Percent Meeting Math Benchmark	Percent Meeting Science Benchmark
Illinois	Alabama	100	19.1	53	34	23	25
Kentucky         100         20.0         60         39         32         32           Louisiana         100         19.4         59         35         27         27           Michigan         100         20.1         59         40         34         34           Mississippi         100         19.0         52         31         21         21           Morthaa         100         20.4         57         44         41         36           North Carolina         100         19.0         47         34         32         26           North Dakota         100         20.6         62         41         42         38           North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         18.5         45         30         29         23	Colorado	100	20.7	63	43	40	39
Louisiana         100         19.4         59         35         27         27           Michigan         100         20.1         59         40         34         34           Mississippi         100         19.0         52         31         21         21           Monthaa         100         20.4         57         44         41         36           North Carolina         100         19.0         47         34         32         26           North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         38         21.5         69         49         44         42           Okl	Illinois	100	20.7	63	41	41	37
Michigan         100         20.1         59         40         34         34           Mississippi         100         19.0         52         31         21         21           Montana         100         20.4         57         44         41         36           North Carolina         100         19.0         47         34         32         26           North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Flori	Kentucky	100	20.0	60	39	32	32
Mississippi         100         19.0         52         31         21         21           Montana         100         20.4         57         44         41         36           North Carolina         100         19.0         47         34         32         26           North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minneso	Louisiana	100	19.4	59	35	27	27
Montana         100         20.4         57         44         41         36           North Carolina         100         19.0         47         34         32         26           North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         30         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri </th <th>Michigan</th> <td>100</td> <td>20.1</td> <td>59</td> <td>40</td> <td>34</td> <td>34</td>	Michigan	100	20.1	59	40	34	34
North Carolina         100         19.0         47         34         32         26           North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dako	Mississippi	100	19.0	52	31	21	21
North Dakota         100         20.6         62         41         42         38           Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dakota         76         21.9         70         54         51         46           Kansas	Montana	100	20.4	57	44	41	36
Tennessee         100         19.8         58         38         30         29           Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dakota         76         21.9         70         54         51         46           Kansas         74         21.9         71         53         49         44           Ohio <t< th=""><th>North Carolina</th><td>100</td><td>19.0</td><td>47</td><td>34</td><td>32</td><td>26</td></t<>	North Carolina	100	19.0	47	34	32	26
Utah         100         20.2         59         44         34         34           Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dakota         76         21.9         70         54         51         46           Kansas         74         21.9         71         53         49         44           Ohio         73         22.2         74         53         52         49           New Mexico <t< th=""><th>North Dakota</th><td>100</td><td>20.6</td><td>62</td><td>41</td><td>42</td><td>38</td></t<>	North Dakota	100	20.6	62	41	42	38
Wyoming         100         20.2         60         40         36         34           Arkansas         93         20.4         62         42         35         32           Hawaii         93         18.5         45         30         29         23           Nebraska         88         21.5         69         49         44         42           Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dakota         76         21.9         70         54         51         46           Kansas         74         21.9         71         53         49         44           Ohio         73         22.0         71         54         49         45           Wisconsin         73         22.2         74         53         52         49           New Mexico	Tennessee	100	19.8	58	38	30	29
Arkansas       93       20.4       62       42       35       32         Hawaii       93       18.5       45       30       29       23         Nebraska       88       21.5       69       49       44       42         Oklahoma       80       20.7       64       47       34       33         Florida       79       19.9       54       42       34       29         Minnesota       78       22.7       74       57       58       53         Missouri       77       21.7       71       51       44       42         South Dakota       76       21.9       70       54       51       46         Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66	Utah	100	20.2	59	44	34	34
Hawaii       93       18.5       45       30       29       23         Nebraska       88       21.5       69       49       44       42         Oklahoma       80       20.7       64       47       34       33         Florida       79       19.9       54       42       34       29         Minnesota       78       22.7       74       57       58       53         Missouri       77       21.7       71       51       44       42         South Dakota       76       21.9       70       54       51       46         Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina	Wyoming	100	20.2	60	40	36	34
Nebraska       88       21.5       69       49       44       42         Oklahoma       80       20.7       64       47       34       33         Florida       79       19.9       54       42       34       29         Minnesota       78       22.7       74       57       58       53         Missouri       77       21.7       71       51       44       42         South Dakota       76       21.9       70       54       51       46         Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       36         Arizona	Arkansas	93	20.4	62	42	35	32
Oklahoma         80         20.7         64         47         34         33           Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dakota         76         21.9         70         54         51         46           Kansas         74         21.9         71         53         49         44           Ohio         73         22.0         71         54         49         45           Wisconsin         73         22.2         74         53         52         49           New Mexico         71         20.1         55         40         33         30           Iowa         67         22.2         75         55         48         48           West Virginia         66         20.8         69         48         34         34           South Carolina         62         20.4         61         43         38         36           Arizona <th>Hawaii</th> <td>93</td> <td>18.5</td> <td>45</td> <td>30</td> <td>29</td> <td>23</td>	Hawaii	93	18.5	45	30	29	23
Florida         79         19.9         54         42         34         29           Minnesota         78         22.7         74         57         58         53           Missouri         77         21.7         71         51         44         42           South Dakota         76         21.9         70         54         51         46           Kansas         74         21.9         71         53         49         44           Ohio         73         22.0         71         54         49         45           Wisconsin         73         22.2         74         53         52         49           New Mexico         71         20.1         55         40         33         30           Iowa         67         22.2         75         55         48         48           West Virginia         66         20.8         69         48         34         34           South Carolina         62         20.4         61         43         38         36           Arizona         56         19.9         54         38         38         31           District of	Nebraska	88	21.5	69	49	44	42
Minnesota       78       22.7       74       57       58       53         Missouri       77       21.7       71       51       44       42         South Dakota       76       21.9       70       54       51       46         Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho </th <th>Oklahoma</th> <td>80</td> <td>20.7</td> <td>64</td> <td>47</td> <td>34</td> <td>33</td>	Oklahoma	80	20.7	64	47	34	33
Missouri       77       21.7       71       51       44       42         South Dakota       76       21.9       70       54       51       46         Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Florida	79	19.9	54	42	34	29
South Dakota       76       21.9       70       54       51       46         Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Minnesota	78	22.7	74	57	58	53
Kansas       74       21.9       71       53       49       44         Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Missouri	77	21.7	71	51	44	42
Ohio       73       22.0       71       54       49       45         Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	South Dakota	76	21.9	70	54	51	46
Wisconsin       73       22.2       74       53       52       49         New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Kansas	74	21.9	71	53	49	44
New Mexico       71       20.1       55       40       33       30         Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Ohio	73	22.0	71	54	49	45
Iowa       67       22.2       75       55       48       48         West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Wisconsin	73	22.2	74	53	52	49
West Virginia       66       20.8       69       48       34       34         South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	New Mexico	71	20.1	55	40	33	30
South Carolina       62       20.4       61       43       38       34         Georgia       58       21.0       64       46       38       36         Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	Iowa	67	22.2	75	55	48	48
Georgia         58         21.0         64         46         38         36           Arizona         56         19.9         54         38         38         31           District of Columbia         42         21.1         57         46         44         39           Idaho         42         22.7         77         60         55         48	West Virginia	66	20.8	69	48	34	34
Arizona       56       19.9       54       38       38       31         District of Columbia       42       21.1       57       46       44       39         Idaho       42       22.7       77       60       55       48	South Carolina	62	20.4	61	43	38	34
District of Columbia         42         21.1         57         46         44         39           Idaho         42         22.7         77         60         55         48	Georgia	58	21.0	64	46	38	36
<b>Idaho</b> 42 22.7 77 60 55 48	Arizona	56	19.9	54	38	38	31
	District of Columbia	42	21.1	57	46	44	39
Indiana         41         22.1         72         54         52         44	Idaho	42	22.7	77	60	55	48
	Indiana	41	22.1	72	54	52	44

## 2015 State Percent of High School Graduates Tested, Average Composite Score, and Percent Meeting Benchmarks by Subject

State	Percent of Graduates Tested*	Average Composite Score	Percent Meeting English Benchmark	Percent Meeting Reading Benchmark	Percent Meeting Math Benchmark	Percent Meeting Science Benchmark
Texas	41	20.9	59	44	44	38
Nevada	40	21.0	64	46	44	37
Alaska	39	21.1	64	50	45	37
Oregon	38	21.5	67	51	47	43
Connecticut	32	24.4	86	68	68	61
California	30	22.5	72	54	56	46
Virginia	30	23.1	77	61	58	53
New Jersey	29	23.2	78	59	63	52
Vermont	29	23.5	80	64	61	56
Massachusetts	28	24.4	85	67	71	61
New York	28	23.7	79	63	66	59
Maryland	25	22.7	73	57	55	50
Washington	25	22.4	68	55	56	49
New Hampshire	23	24.3	86	68	68	62
Pennsylvania	22	22.9	76	59	58	51
Delaware	21	23.5	79	64	59	54
Rhode Island	19	23.1	78	63	58	52
Maine	10	24.2	85	68	66	59
National	59	21.0	64	46	42	38

<sup>\*</sup> Totals for graduating seniors were obtained from *Knocking at the College Door: Projections of High School Graduates*, 8th edition. © December 2012 by the Western Interstate Commission for Higher Education.



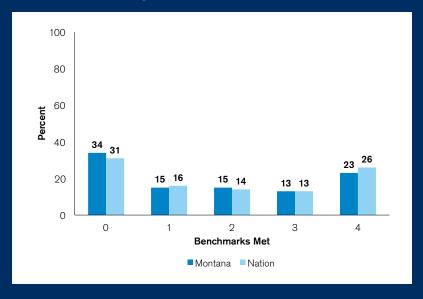
# Looking Back at the Class of 2014

### **Montana**

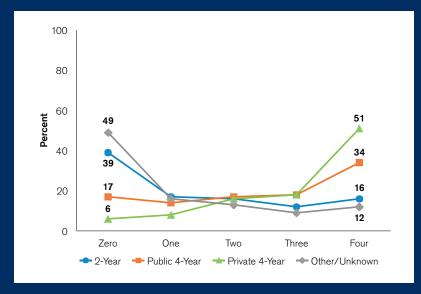
ACT College Readiness Benchmarks and Fall 2014 College Enrollment

Academic achievement, as measured by ACT College Readiness Benchmark attainment, has a clear and distinctive relationship with the path taken by high school graduates. Those who were more academically ready were more likely to enroll in 4-year institutions. Graduates who enrolled in 2-year colleges or pursued other options after high school were more likely to have met fewer Benchmarks. For the sizable number of 2014 graduates who did not meet any Benchmarks, their post-high school opportunities appear to have been limited compared to their college-ready peers.

Percent of 2014 ACT-Tested High School Graduates by Number of ACT College Readiness Benchmarks Attained



Percent of 2014 ACT-Tested High School Graduates by Number of ACT College Readiness Benchmarks Attained and Fall 2014 College Enrollment Status



## **Policies and Practices**

### Call to Action

The Condition of College & Career Readiness 2015 points to the need for federal, state, and local policymakers and agency heads to support the readiness of all students for college and career. Over the last several years, the average national ACT Composite score and ACT College Readiness Benchmark attainment of students taking the ACT has remained relatively constant. This is commendable given the increase in the number of students taking the ACT but little comfort to the students, teachers, and administrators working every day to increase student achievement. Because the current direction and aim of our education system is to prepare all students for postsecondary and career success, this year's results continue to signal the need for increased wholesale systemic supports and reforms.

As a research-based nonprofit organization, ACT is committed to identifying solutions that are informed by data and that reinforce the need for students to meet appropriate achievement benchmarks at every point along the continuum from kindergarten through career. As part of this commitment, ACT released a series of policy platforms (http://www.act.org/policyplatforms) in December 2014 containing extensive recommendations in three areas: K–12 education, postsecondary education, and workforce development.

In this same spirit, ACT offers the following recommendations as a call to action for the entire education community: students; parents; educators; and policymakers at the district, state, and federal levels.

#### Data Use

Ensure that student data collected are appropriately safeguarded and used responsibly, balancing data's potential to help students achieve education and workplace success with the responsibility to ensure students' privacy and confidentiality. ACT takes steps to protect the privacy of student data and encourages others to do so, as well. The science behind the ACT assessmentsthe evidence base and ongoing research—relies on our ability to collect and analyze student assessment data and is critical in answering the key question of what matters most in helping people to succeed in education and work. Further, some student data are used for the ACT Educational Opportunity Service, an opt-in program that provides students—including many underserved and first-generation college students—with information about educational, scholarship, career, and financial aid opportunities. We call on policymakers to seek innovative solutions that secure student data and at the same time provide expanded opportunities for students and advance educational research.

## System Alignment

Encourage education system alignment so that all components work together. In a climate conditioned to the

strict accountability mandates in the No Child Left Behind Act, alignment seems to refer only to how assessments align to particular standards, and in many cases has forced educators to think only about test scores. True education system alignment means that all components—standards, curricula, assessments, and instruction—work together to achieve desired goals (Ananda, 2003; Resnick, Rothman, Slattery, and Vranek, 2003; Webb, 1997b). State and federal policymakers must prioritize funding to ensure that the necessary pieces are in place to help all students meet college and career readiness standards.

### Teacher Support and Development

**Develop robust teacher evaluation systems.** Efforts to safeguard and use data appropriately and to fully align the education system are moot if we do not invest in one of the most important components of student learning: teachers. As stated in our K–12 education platform, ACT applauds states' and districts' development and use of robust teacher evaluation systems that include multiple measures of performance to identify effective teaching and focus on professional development. All teacher evaluations should include classroom observations, parent and student surveys, and measures of student growth on assessments, and teachers should be involved in the creation and rollout of these systems.

Strengthen admissions criteria for teacher education programs and offer professional development to new teachers. We must ensure that the admissions criteria for teacher education programs are rigorous and produce high-quality candidates armed with the tools—sound instructional methods, content mastery, and data literacy—to teach effectively. Once in the classroom, teachers must have the opportunity to participate in professional development opportunities that enhance their work.

Increase teacher compensation. Given that teachers are the most important school-based factor in student achievement, if we truly want the best teaching force in the world, teachers must be compensated correspondingly. Doing so demonstrates investment not only in teachers but in students.

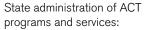
It is time to take these and other meaningful steps to solve the issues hindering student success. ACT sincerely hopes that this call to action, informed by decades of educational research, contributes to the enhancement of education and career opportunities for all students, including our nation's most underserved individuals. ACT stands ready to work with like-minded organizations to support systemic education reforms. Ensuring a world-class US educational system should be a responsibility shared by all of us: our future rests on the education of tomorrow's leaders. We must do better.



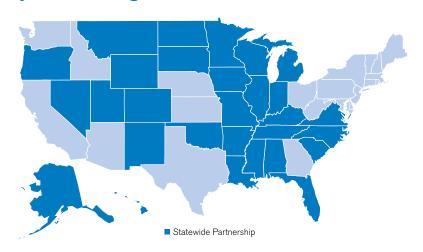
# Resources

## **Statewide Partnerships in College and Career Readiness**

States that incorporate ACT college and career readiness solutions as part of their statewide assessments provide greater access to higher education and increase the likelihood of student success in postsecondary education. Educators also have the ability to establish a longitudinal plan using ACT assessments, which provide high schools, districts, and states with unique student-level data that can be used for effective student intervention plans.



- Increases opportunities for minority and middle- to low-income students.
- Promotes student educational and career planning.
- Reduces the need for remediation.



- · Correlates with increases in college enrollment, persistence, and student success.
- · Aligns with state standards.

ACT Aspire	<b>ACT</b> Explore	ACT Plan	The ACT	<b>ACT</b> QualityCore	<b>ACT</b> WorkKeys		
3rd- through 8th-grade students	8th- and 9th-grade students	10th-grade students	11th- and 12th-grade students	8th- through 12th-grade students	11th- and 12th-grade students	ACT Nationa Readiness C	
Alabama Arkansas Hawaii  8th- through 10th-grade students  Alabama Arkansas Hawaii Wisconsin Wyoming	Arkansas Louisiana North Carolina Oklahoma Tennessee Utah	Arkansas Florida Louisiana North Carolina Oklahoma Tennessee Utah	Alabama Alaska Arkansas Colorado Hawaii Illinois Kentucky Louisiana Minnesota Mississippi Missouri Montana Nevada North Carolina North Dakota Tennessee Utah Wisconsin	Alabama Kentucky	Alabama Alaska Hawaii Kentucky Louisiana Michigan North Carolina North Dakota South Carolina Wisconsin Wyoming	Alabama Alaska Arkansas Indiana Iowa Kentucky Louisiana Minnesota Missouri New Mexico North Carolina	Oklahoma Oregon South Carolina South Dakota Tennessee Utah Virginia Wisconsin
			Wisconsin Wyoming				

All listed partnerships are effective as of July 2015.

# **ACT Research**

The continued increase of test takers enhances the breadth and depth of the data pool, providing a comprehensive picture of the current college readiness levels of the graduating class as well as offering a glimpse of the emerging national educational pipeline. It also allows us to review various aspects of the ACT-tested graduating class, including the following reports:

#### Releasing in the 2015-2016 Academic Year

The Condition of STEM 2015

- National report
- State reports
- Underserved learners

The Condition of College and Career Readiness 2015

- National report
- State reports
- African American students
- American Indian students
- Asian students

- Hispanic students
- Pacific Islander students
- · First-generation students
- · Linguistically diverse students
- Students from low-income families

#### Other ACT Research Reports

#### College Choice Report (for the graduating class of 2013)

- Part 1: Preferences and Prospects—November 2013
- Part 2: Enrollment Patterns—July 2014
- Part 3: Persistence and Transfer—April 2015

#### College Choice Report (for the graduating class of 2014)

- Part 1: Expanding Opportunities: Preferences and Prospects—November 2014
- Part 2: Expanding Opportunities: Enrollment Patterns— July 2015

To be notified of exact release dates, please subscribe here: www.act.org/research/subscribe.html.

## **How Does ACT Determine if Students Are College Ready?**

The ACT College Readiness Benchmarks are scores on the ACT subject area tests that represent the level of achievement required for students to have a 50% chance of obtaining a B or higher or about a 75% chance of obtaining a C or higher in corresponding credit-bearing first-year college courses. Based on a nationally stratified sample, the Benchmarks are median course placement values for these institutions and represent a typical set of expectations. ACT College Readiness Benchmarks were revised for 2013 graduating class reporting. The ACT College Readiness Benchmarks are:

College Course	Subject Area Test	Original ACT College Readiness Benchmark	Revised ACT College Readiness Benchmark
English Composition	English	18	18
Social Sciences	Reading	21	22
College Algebra	Mathematics	22	22
Biology	Science	24	23

#### **Notes**

- The data presented herein are based on the ACT Profile Report— State: Graduating Class 2015 for each respective state, accessible at www.act.org/readiness/2015. With the exception of the top graph on page 6, data related to students who did not provide information or who responded "Other" to questions about gender, race/ethnicity, high school curriculum, etc., are not presented explicitly.
- The race/ethnicity categories changed in 2011 to reflect updated US Department of Education reporting requirements; trends to previous reports may not be available for all race/ethnicity categories.
- Data reflect subject-specific curriculum. For example, English "Core or More" results pertain to students who took at least four years of English, regardless of courses taken in other subject areas.
- 4. The interest-major fit score measures the strength of the relationship between the student's profile of ACT Interest Inventory scores and the profile of students' interests in the major shown. Interest profiles for majors are based on a national sample of undergraduate students with a declared major and a GPA of at least 2.0. Major was determined in the third year for students in 4-year colleges and in the second year for students in 2-year colleges. Interest-major fit scores range from 0–99, with values of 80 and higher indicating good fit.



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A copy of this report can be found at **www.act.org/readiness/2015** 

