

Completion Strategy from 2014:

23. Peer mentoring for all first-time and transfer students throughout the first year. This retention best practice has been in place for years but retention enhancements such as Starfish continue to improve the effectiveness of this practice.

Current Status:

Peer Mentoring program was evaluated and it was determined that we could do it more effectively and efficiently by attaching Peer Leaders to the newly created First Year Course.

Moving Forward

Peer leaders will be hired for each First Year Course this year, and plans will be made to triple that number for next year when the course becomes mandatory.

Completion Strategy from 2014:

24. Increase tutoring services, including e-Tutoring. Our research indicates that our students who use tutoring services are much more successful than those who don't. We have aggressively taken advantage of the statewide E-tutoring initiative.

Current Status:

Outcomes for students that utilize tutorial services continue to demonstrate a positive effect of 1:1 tutoring. 86% of students that used tutoring F15 passed their courses. The benefits also extend to the tutors as they receive extensive training and development of skills that will be used professionally. Usage of tutoring services continues to increase even though enrollment has not increased. E-tutoring usage however, has not increased. YSU students most often use e-tutoring for submitting papers for proof-reading although we have heavily promoted and marketed the E-tutoring service across campus.

Moving Forward

We will expand the number of tutors on staff. For S16, we have a 20% increase of pending requests from students that we have not been able to fill.

Completion Strategy from 2014:

25. Increase supplemental instruction opportunities. Numerous studies have concluded that supplemental instruction is a very effective tool for enhancing success, particularly in the most difficult classes. We were an early adopter of this practice and continue to expand it.

Current Status:

We have expanded our supplemental program each of the last couple years. We now have 23 courses covered by SI leaders (+21%) and have expanded into the math department by covering two developmental math courses and Calculus 2. Grades are higher for every course covered by SI for those students that attend.

Moving Forward

We will continue to work with faculty to identify courses that could be well served with an SI component.

4. Updated Completion Goals for 2016 - 18

- Implement a required first year experience course
- We will hire a new First Year Program Director
- Create Learning Outcomes for Guests and Students
- Reduce the caseload for individual peer leaders from 120 to 25
- Increase use of tutoring services especially in high D/F/W Courses
- Increase opportunities for supplemental instruction
- Align systems of advising across the colleges
- Invest in a program that has shown results with Underrepresented populations
- Each college is working with EGCC to provide clear, simple pathways for students to progress from EGCC to YSU
- Establish co-requisite remediation in math
- Implement dual enrollment with Eastern Gateway Community College (EGCC)
- Administer Senior Survey to capture data designed to enhance programs
- Ensure that courses are available when needed
- Incentive program for faculty to use free open sources in the classroom
- Needs based employment
- Increase number of hours students take to set them on a path to graduation

5. Completion Strategies:

Focus Area	Strategy	Leadership	Involvement	Outcome	Measure	Timeline
What are we focused on?	What will we DO?	Who's responsible	Other Constituencies	How do we know if we're successful?	How do we measure Success?	What is our Timeline?
FIRST YEAR EXPERIENCE - Course	Implement a required first year experience course	New Director	Student Success, First Year Programs, Gen Ed Committee	All students will take this class	100% of Students are enrolled in a FY class.	Aug. 2017
FIRST YEAR EXPERIENCE - Staffing	We will hire a new First Year Programs Director	Provost/Associate Provost	Student Success, First Year Programs, Gen Ed Committee	Director starts by 8/1/2016	Director is hired	Aug. 2016
FIRST YEAR EXPERIENCE - New Student Orientation	Create Learning Outcomes for Guests and Students	Leslie Page	Student Success, Academic Advisors, First year Course	Students and Guests are more connected to the institution	90% of participants will evaluate the outcomes positively	Aug. 2017
FIRST YEAR EXPERIENCE - Peer Mentoring	Reduce the case load for individual peer leaders from 120 to 25.	Karen Graves	FY course director, Faculty	higher significant contacts	Each Leader will meet with each student a minimum of 3 times	Jan. 2018
ACADEMIC ASSISTANCE - Tutoring	Increase use of tutoring services especially in high D/F/W Courses	Robin Sakonyi	Faculty, Deans/ CSP,	Less D/F/Ws	Total # of students utilizing tutoring in specific courses	Aug. 2017
ACADEMIC ASSISTANCE - Supplemental Instruction	Increase opportunities for supplemental instruction.	Sue Mark-Sracic	Faculty, Deans/ CSP,	Less D/F/Ws	Total # of students enrolled in S/I courses	Aug. 2017
ACADEMIC ASSISTANCE - Student Advising	Align systems of advising across the colleges.	Director of Career and Academic Advising	Student Success, Academic Advisors, Deans	Better advising for students	Unified Note taking and communication system	Jan. 2017
ACADEMIC ASSISTANCE - Summer Bridge & Beyond	Invest in a program that has shown results with Underrepresented populations	Mike Beverly	Student Success, Center for Student Progress, High Schools	Triple the size of the current program	100 students will participate in the program in the summer of 2018	July 2018
ACADEMIC PROGRESS - Matriculation Agreements	Each college is working with EGCC to provide clear, simple pathways for students to progress from EGCC to YSU.	Kevin Ball	Deans	Students will successfully matriculate	Initial cohort of 25 students in each college	Aug. 2017
ACADEMIC PROGRESS - Co-Requisite remediation	Establish co-requisite remediation in math.	Angela Spalsbury	Deans, faculty	Students will successfully matriculate	D/F/W rates will be reduced in these select courses	Aug. 2017
ACADEMIC PROGRESS - Dual Enrollment	Implement dual enrollment with Eastern Gateway Community College (EGCC).	Kevin Ball	Provost's Office, Deans?	Students will enroll in the best location	Initial cohort of 50 students	Aug. 2017
ACADEMIC PROGRESS - Senior Survey	Administer Senior Survey to capture data designed to enhance programs	College Deans	Chairs, Faculty	Enhance academic programs	Senior Survey is administered in all program areas	Aug. 2017
ACADEMIC PROGRESS - Course Availability	Ensure that courses are available when needed.	Kevin Ball	Dean, Chairs, Faculty	More students graduating in 6 yrs or less	Graduation Rates	Aug. 2018
INCREASED AFFORDABILITY - Text Books	Incentive program for faculty to use free open sources in the classroom	Provost	Provost, Academic Senate	Less cost to students	Number of faculty involved in the program	Aug. 2017
INCREASED AFFORDABILITY - Student work	Needs based employment	Mike Reagle	Financial Aid, Enrollment Mgmt	Utilize student work funds for financially at risk students	25% of student Work allocations will be distributed to students with high financial need	Aug. 2017
INCREASED AFFORDABILITY - Increase hours students are taking	Increase number of hours students take to set them on a path to graduation	Mike Reagle	College Deans, Student Success	More students graduating in 6 yrs or less	Graduation Rates	Aug. 2018

6. Workforce Development Priorities

Youngstown State University provides significant value to the Youngstown-Warren metropolitan area, northeast Ohio, the state and the nation through research, scholarship, innovation, creative/scholarly activities, and service and workforce development. YSU views economic impact as a symbiotic relationship amongst businesses, industries, technological enterprises, government, and non-profit organizations. Regional Engagement is one of the four cornerstones of the YSU 2020 Strategic Plan and within that cornerstone, a featured theme is *providing value to business, industry, and non-profit organizations*.

Priorities

Our academic and workforce development priorities include those “in-demand” industries identified by JobsOhio which are poised to transform Ohio:

1. Advanced Manufacturing
2. Aerospace & Aviation
3. Food Processing
4. Automotive
5. BioHealth
6. Shale Energy and Petrochemical
7. Financial Services
8. Information Technology
9. Logistics and Distribution

In support of Workforce Development, YSU is committed to cultivating and sustaining appropriate bilateral and multilateral engagements amongst faculty, staff, students, and regional business, technological enterprises, industry, and non-profit organizations. The University has focused building strong relationships with University faculty and the respective organizations' professional staff, leading to a broad and deep relationship amongst a variety of partners.

These partnerships result in significant and meaningful Workforce Development opportunities for YSU students, including frequent exposure to business and industry personnel, student internships, coops, clinical externships, entrepreneurial opportunities, and collaborative research.

Internships

In 2012 YSU was awarded a \$573,300 Ohio Means Internships and Co-ops grant from the Ohio Board of Regents. The grant program was part of Gov. John Kasich's workforce development strategy to align Ohio's higher education curriculum with skills that are in demand by Ohio businesses. YSU used the grant to establish the Program for Internships and Co-ops in Advanced Manufacturing and Related Industries, or PICAM. PICAM funded 45 full-time and 62 part-time paid internships for students in the College of Science, Technology, Engineering and Mathematics and the Williamson College of Business. The program also called for YSU's STEM and Business colleges to jointly design and implement new courses in professional practice preparation and to host new, semiannual co-op and internship recruiting events on campus.

The program also calls for restructuring curricula in accounting, business, finance, industrial systems engineering, management, marketing, mechanical engineering and other disciplines to provide for more professional practice opportunities. One of the goals is that increasing internship and co-op opportunities will lead to higher completion rates because it will help students better realize their long-term career objectives and motivate them to finish their degree so that they can reach those objectives.

In 2014 YSU received an additional \$661,013 grant from the Ohio Board of Regents to allow YSU to continue this work of increasing and expanding paid internship and co-op experiences for its students. The grant will also allow YSU to create a self-sustaining professional development suite to be used by students and businesses providing training in soft and hard skills and to enhance the coordination of infrastructure programs in the region.

In addition to these grant-funded internship opportunities, nearly every YSU student has the opportunity to pursue a credit bearing internship as part of their major. The Office of Career Services helps to place students in internships.

Workforce Related Initiatives:

- YSU's Center for Innovation in Additive Manufacturing (CIAM) was created to advance research, education, workforce development, and industry partnerships in this emerging field. CIAM is the focal point for additive manufacturing activities, providing a resource for the College of Science, Technology, Engineering, and Mathematics (STEM) but also for other academic divisions, including the arts and health sciences.

This Center offers the following services:

- Materials characterization
- Process development for materials
- Precision post-processing of printed parts
- Innovative business strategies
- Digital manufacturing thread for Additive Manufacturing
- Design for Additive Manufacturing

Current assets within the CIAM:

- ExOne M-Flex and X1-Lab binder jetting printers capable of printing metal and ceramic parts. The M-Flex is a production system with a build volume of 400 x 250 x 250 mm (15.7 x 9.8 x 9.8 in.).
- 3-D printing kiosk in the lobby of Moser Hall with two MakerGear M2 printers available for use by the campus community.
- MakerBot Replicator 2X dual extruder printer capable of either printing two colors or printing a part material and a dissolvable support filament.
- A Hyrel 3-D printer with high resolution and thin wall capability.
- Siemens NX PLM software including the full suite of drawing, analysis, automation, manufacturing and production modules.
- Sintering furnace, enabling the sintering of high-temperature metals and advanced ceramics made with the lab's two high-end 3D printers. It allows final processing of 3D printed parts made from advanced materials for uses in aerospace, automotive, industrial, energy and medical applications.

The center features two high-end 3D printers available for research by both undergraduate- and graduate-level students, as well as students enrolled in the university's PhD program in materials science and engineering (first YSU PhD will be awarded in May, 2016). The lab supports education and workforce development in

additive manufacturing.

The university played a central role in the federal government's decision in August, 2012 to select downtown Youngstown as the site of the first National Additive Manufacturing Innovation Institute, America Makes. YSU students and faculty are regularly engaged in America Makes activities.

- The YSU *Natural Gas and Water Resources Institute* provides undergraduate degree level courses in science and engineering that will lead to an academic minor in gas technologies and also will provide research opportunities for industry focusing on analysis of water used in the shale gas extraction process. Because of YSU's location in the Utica shale region of Ohio, this Institute meets the educational and research needs of a new and growing industry. A recent study showed that more than 200,000 jobs, including nearly 9,000 in professional and technical services, will be created or supported by 2025 due to exploration, leasing, drilling, and pipeline construction for the Utica shale reserve.
- The *Bitonte College of Health and Human Services* provides students with the opportunity to gain important clinical education experiences in hospitals, clinics, physician offices, and at community and special events. Clinical experiences are offered in all of the Health and Human Services programs, including Nursing, Respiratory Care, Dental Hygiene, Healthcare Management, Social Work, Dietetics, and Physical Therapy. A recently signed "Affinity Agreement" with Mercy Health, Ohio's largest healthcare provider with institutions located throughout the Mahoning Valley, will provide expanded opportunities for clinical experiences for students.
- Clinical and field experiences offered by *Youngstown State University's Beeghly College of Education (BCOE)* are well planned, numerous and diverse. The nature and duration of field-based activities vary in the amount of observation and participation according to the specific course and program requirements. All BCOE professional education courses have some field or clinical component(s). The progression of field experience culminates in Student Teaching, considered to be the capstone clinical experience for all teacher education program majors.
- *ConneX* is Youngstown State University's corporate communication consulting and training center. Housed in the College of Creative Arts and Communication's Department of Communication, ConneX offers some of the best (and inexpensive) communication consulting, training and services in the world. Students provide

communication and training consulting to local businesses while gaining valuable 21st Century communication skills. ConneX offers specialized training and consulting based on the expertise of experienced faculty at Youngstown State University. With the introduction of our new graduate degree program in Interdisciplinary Communication, faculty experts are able to assemble teams to assist in training, consulting, and research that fits corporate and industry needs. ConneX training areas:

- Public speaking and presentation skills
 - Public and Media Relations
 - Leadership and Team Building Skills
 - Workplace Diversity
 - Social Media Management
 - Internal/External Communication Assessment
 - Conflict Management and Negotiation
 - Corporate Video Development, Web Video, Video Storytelling
 - Business Research Methods (e.g., designing online surveys, qualitative and quantitative analysis)
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- The YSU History Department, in the College of Liberal Arts and Social Sciences, provides internship opportunities to its students through the *Youngstown Historical Center of Industry and Labor*. The museum features hundreds of photographs representing labor, immigration and urban history. Objects on display range from workers' tools and clothing to hundreds of photographs. In addition to exhibits, the center offers educational programs and an archives/library. Part of the Ohio Network of American History Research Centers, the archives/library serves as a repository for local government records, as well as manuscripts collected from workers, companies and labor organizations. YSU student interns are learning curation, conservation, and archival practices.
 - The *YSU Center for Nonprofit Leadership*, housed in the Williamson College of Business Administration, provides academic programming and professional development experiences for students interested in pursuing a career in nonprofit management and/or serving the community. This Center places students in academically-focused and for-credit career-related internships at regional nonprofit organizations.

Emerging Workforce Development Initiatives

The Mahoning Valley Innovation & Commercialization Center (MVICC), with initial capital funding support from the Ohio Legislature, will be an entrepreneurial hub connecting creative minds with the modern equipment of advanced manufacturing (including 3D printing) and the knowledge of the regional business community. By integrating innovation, technology development, entrepreneurial support, and partnerships with the business and local communities, the center will accelerate the development from concept to product, creating products and jobs that promote the quality of life throughout the region.

By working collaboratively with the business community, Eastern Gateway Community College, the cities of Youngstown and Warren, area incubators, and county K-12 educational providers, this multi-stakeholder center will become a driving force for economic growth and prosperity in the region. The center brings together essential elements in one cohesive location, combining educational and research space with a 21st century manufacturing laboratory, and the innovation and project space required for multidisciplinary collaboration, creating a unique environment in which innovation and entrepreneurship can thrive.

This 100,000 square foot facility will be located on the Youngstown State University campus, and will be owned and operated by Youngstown State University, on behalf of partnering organizations. Collaboration will be ensured through memoranda of understanding with other entities, such as Eastern Gateway Community College, the City of Youngstown, area incubators, and K-12 educational providers for the efficient and effective use of the facility and the equipment contained therein.

The partners on this project have a long history of successful collaboration and job creation. Memoranda of understanding and collaborative agreements already exist between partner entities that support workforce development initiatives for co-op/internship programs, small business development programs, and other entrepreneurship initiatives.

We have recently demonstrated the creation and retention of 500 jobs through State IRDCP funding provided in support of the America Makes project. Support of small manufacturing businesses through integrated research, development, and education networks has been a critical component of our regional success. This project creates the collaborative space that embodies our integrative approach, leading to cost-saving efficiencies as partnering entities expand on prior successful activities and continue to create and retain jobs for our region and throughout the state.

Measurement and Assessment-Workforce Development

In monitoring those variables that contribute to Completeness, Youngstown State University's College of Science, Technology, Engineering, and Mathematics and YSU's Williamson College of Business Administration track activity related to Registered Internships and Coop Programs, especially with respect to the "In-Demand Industries" identified by the State.

Following are several attachments depicting the types of metrics being captured on number and type of internships, wages, and impact from each academic program. While additional details are monitored, the following charts indicate representative metrics.

Attachment A depicts several of the student coop and internship experiences from the College of Science, Technology, Engineering, and Mathematics (STEM) over the past two years, with emphasis on "in demand" jobs. Student Major, Industry NAICS Code, "In Demand Industry", Employer Name, and number of hours worked are presented for several of the past semesters.

Attachment B is the STEM College Experiential Learning Report for 2015-16. It provides relevant data from STEM student internships, including wages, industries, and companies.

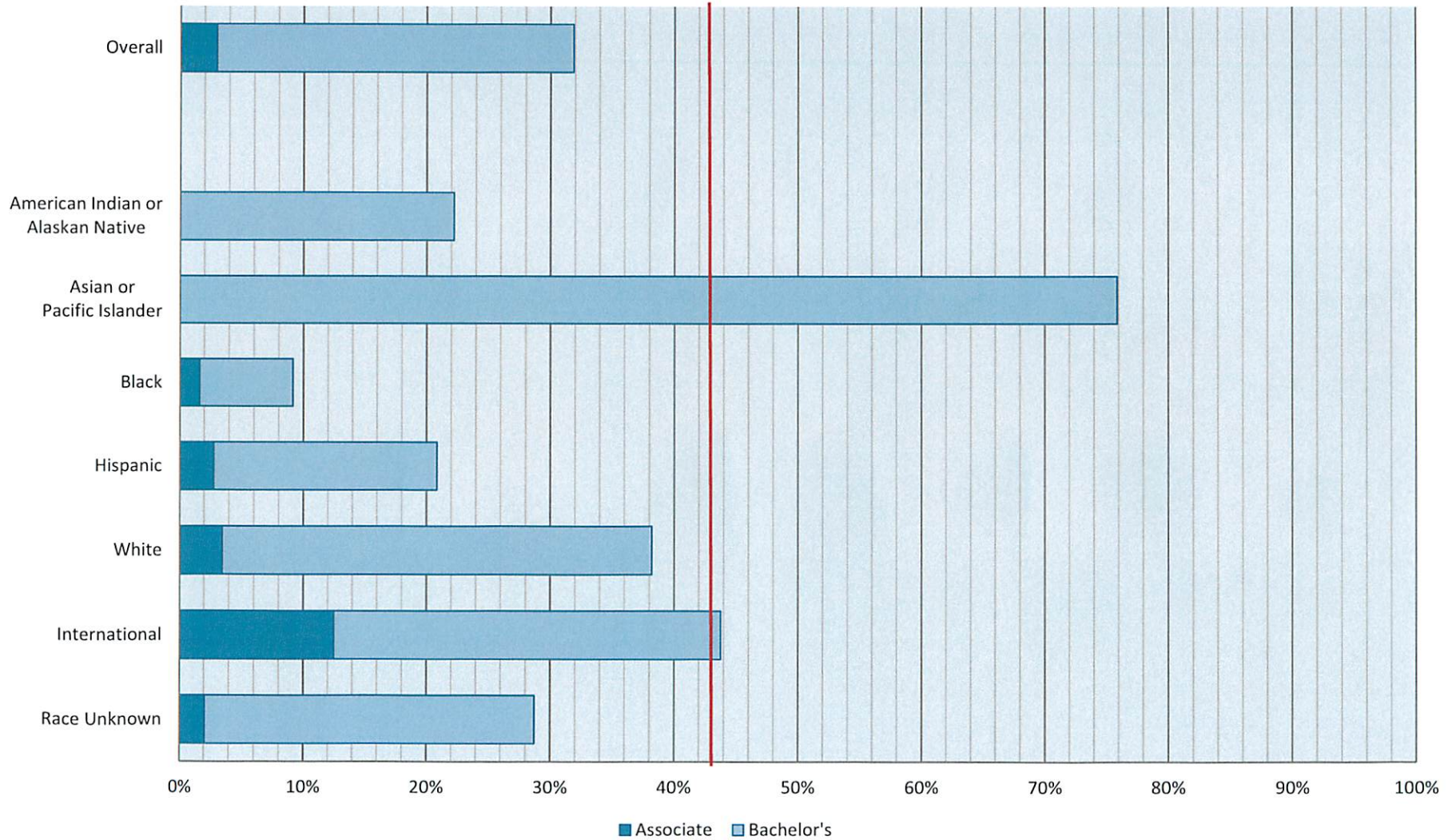
Attachment C summarizes coops and internships completed by students from the Williamson College of Business Administration, including internships by academic major since 1999, with additional details regarding student wages for the 2014 academic year.

As an added metric of campus completeness, each year Youngstown State University's Office of Career Services surveys graduating seniors to assess near term employment, graduate school attendance, or other status within one year of graduation. Additionally, undergraduates are asked to report starting salary, and location of employment. Attachment D depicts a portion of the more relevant data from 2014-2015, the most recently completed survey.

Youngstown State University

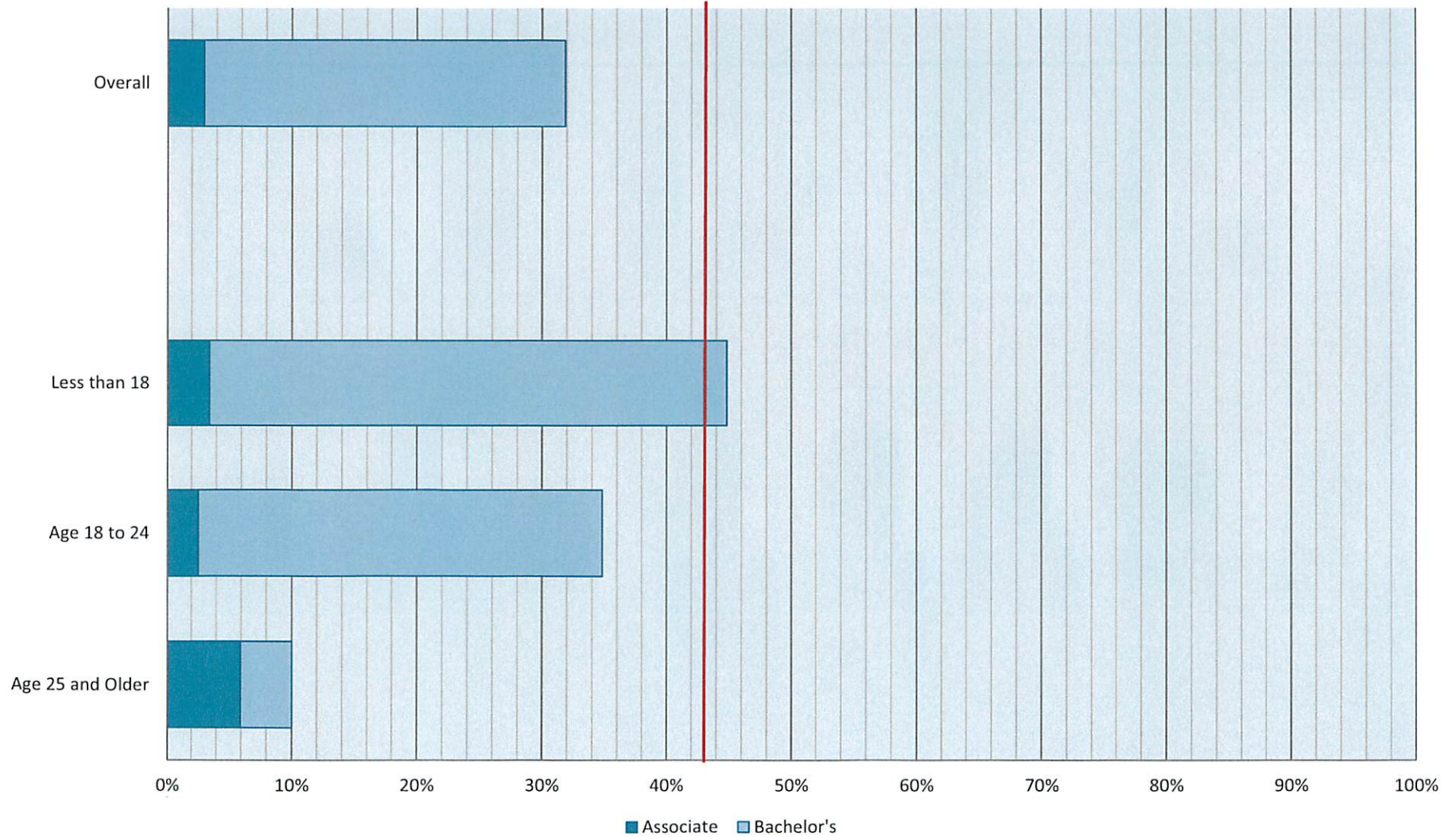
2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by Race/Ethnicity

Overall
2020 Goal = 43%



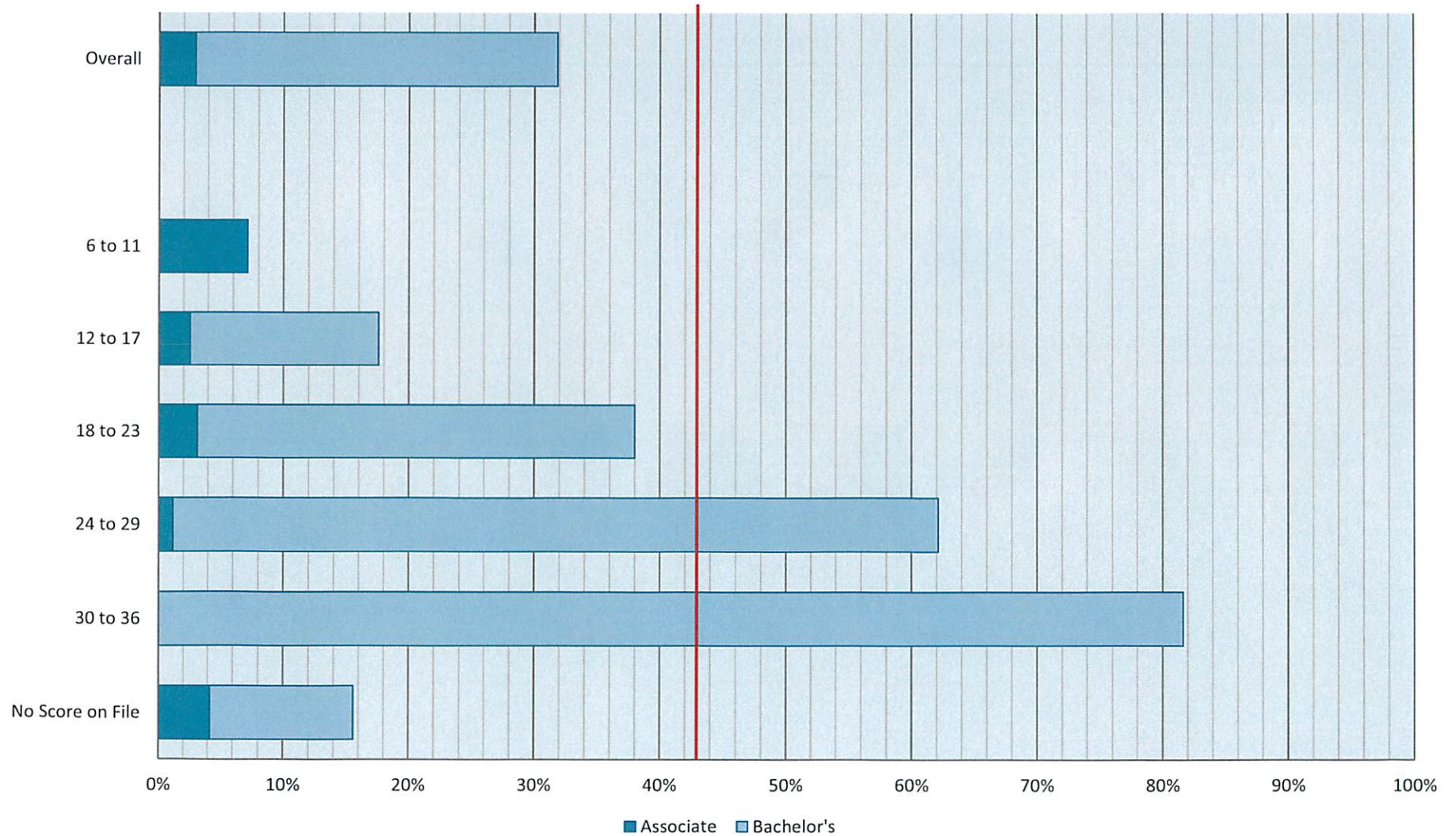
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by Age Group

Overall
2020 Goal = 43%



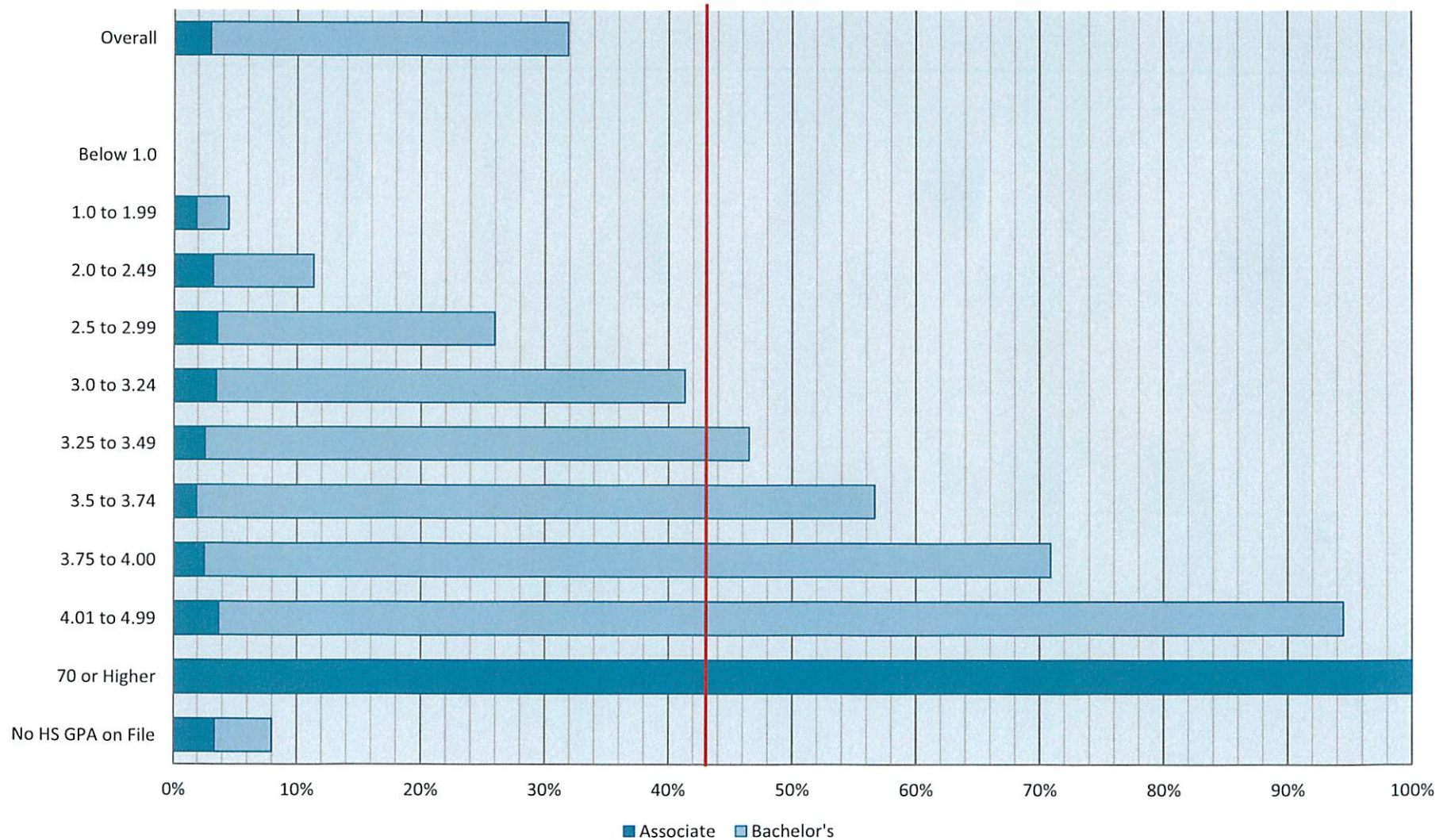
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by ACT Composite Score Range

Overall
2020 Goal = 43%



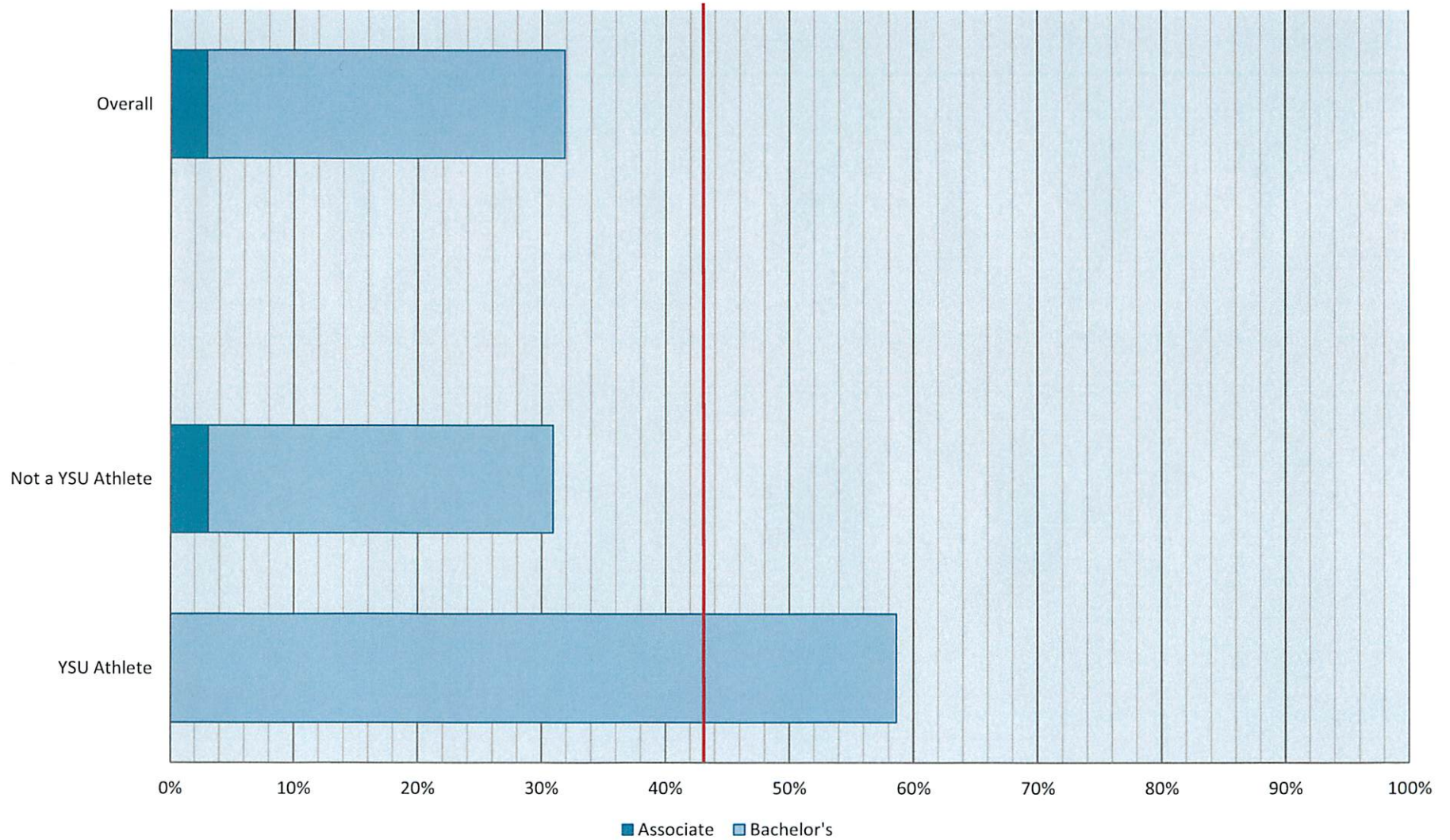
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by High School GPA Range

Overall
2020 Goal = 43%



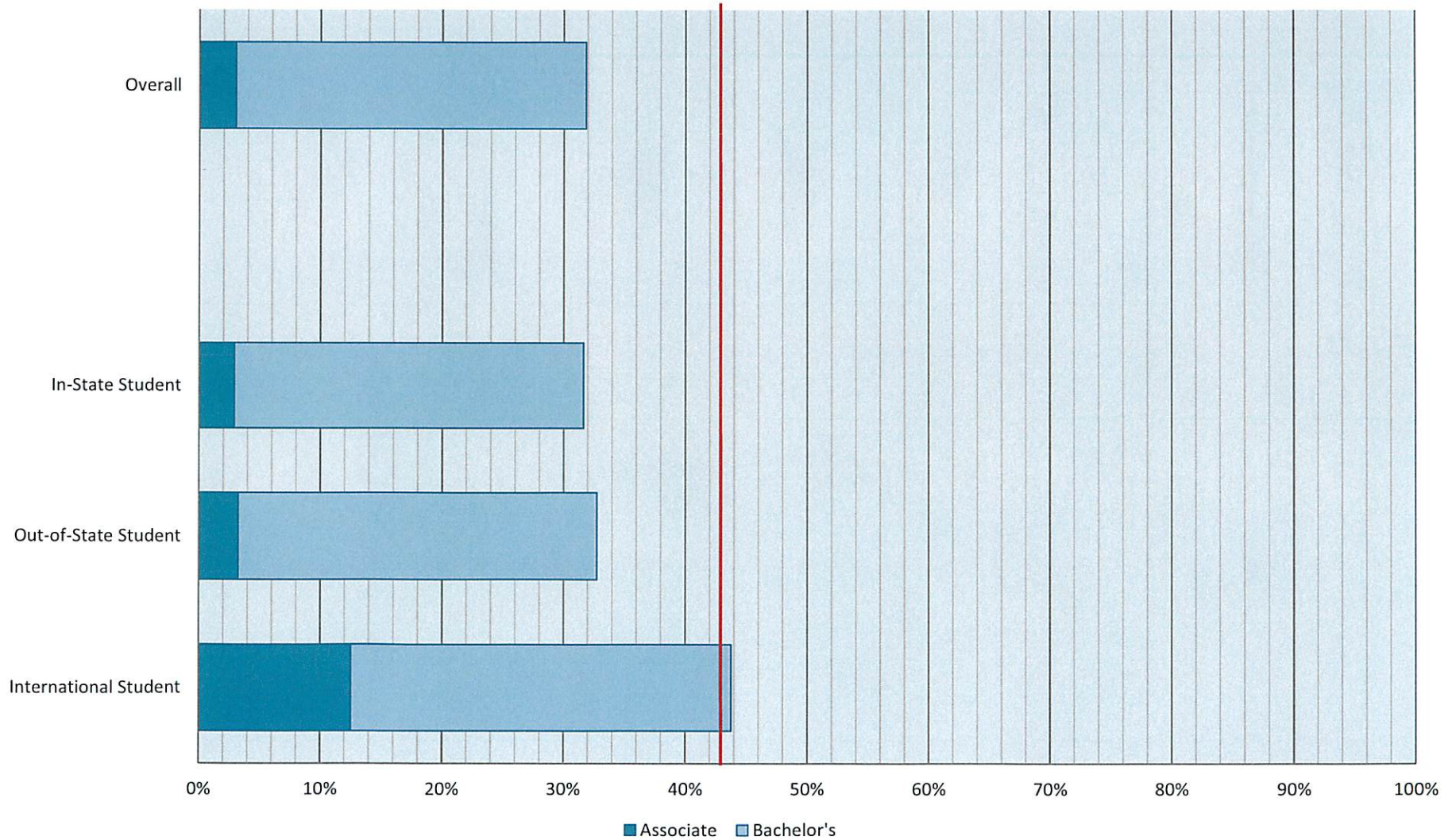
Youngstown State University
2009 First-Time, Full-Time Degree Seeking Undergraduate
Six-Year Graduation Rates
by YSU Athlete Status 2009-10

Overall
2020 Goal = 43%



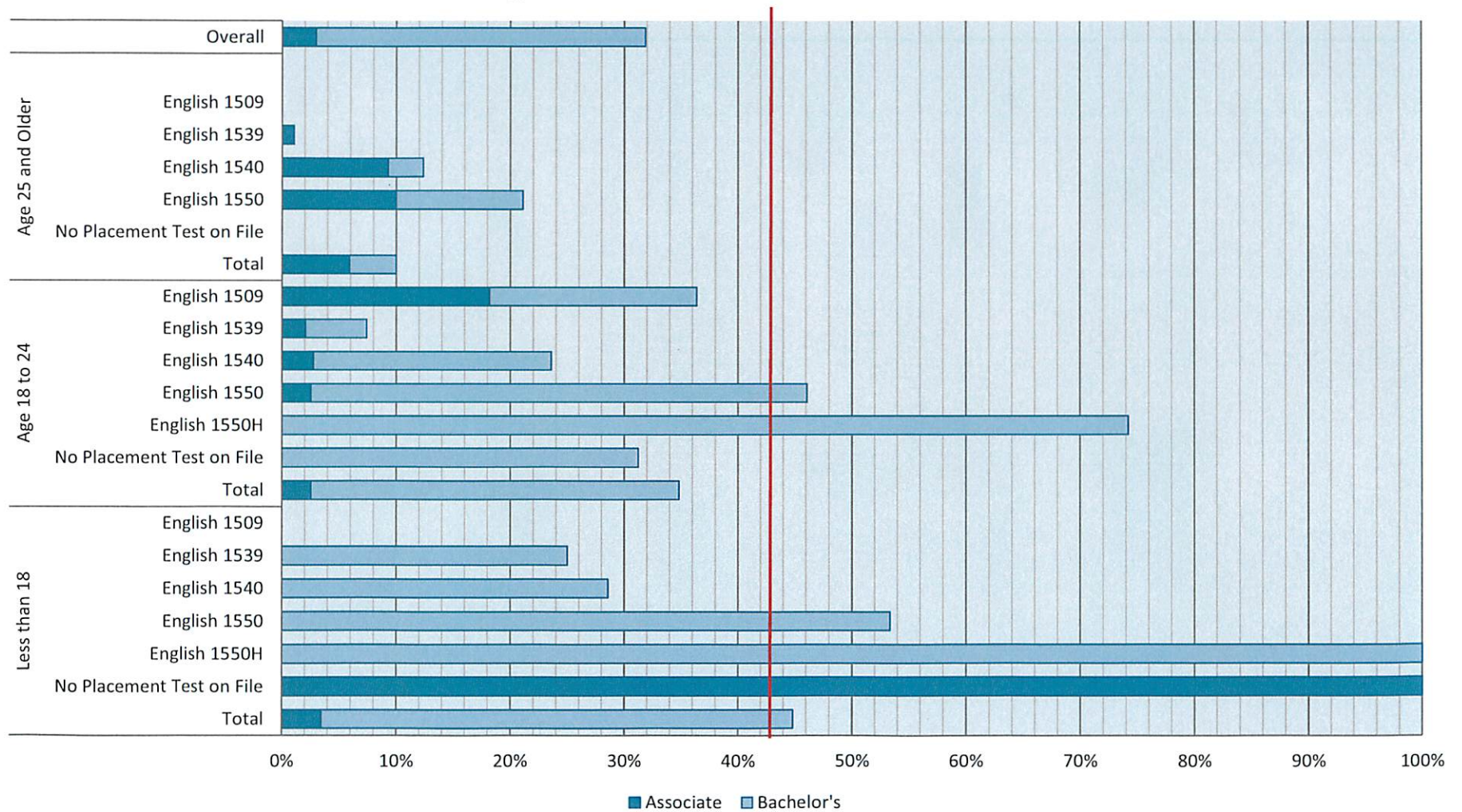
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by Residency Status

Overall
2020 Goal = 43%



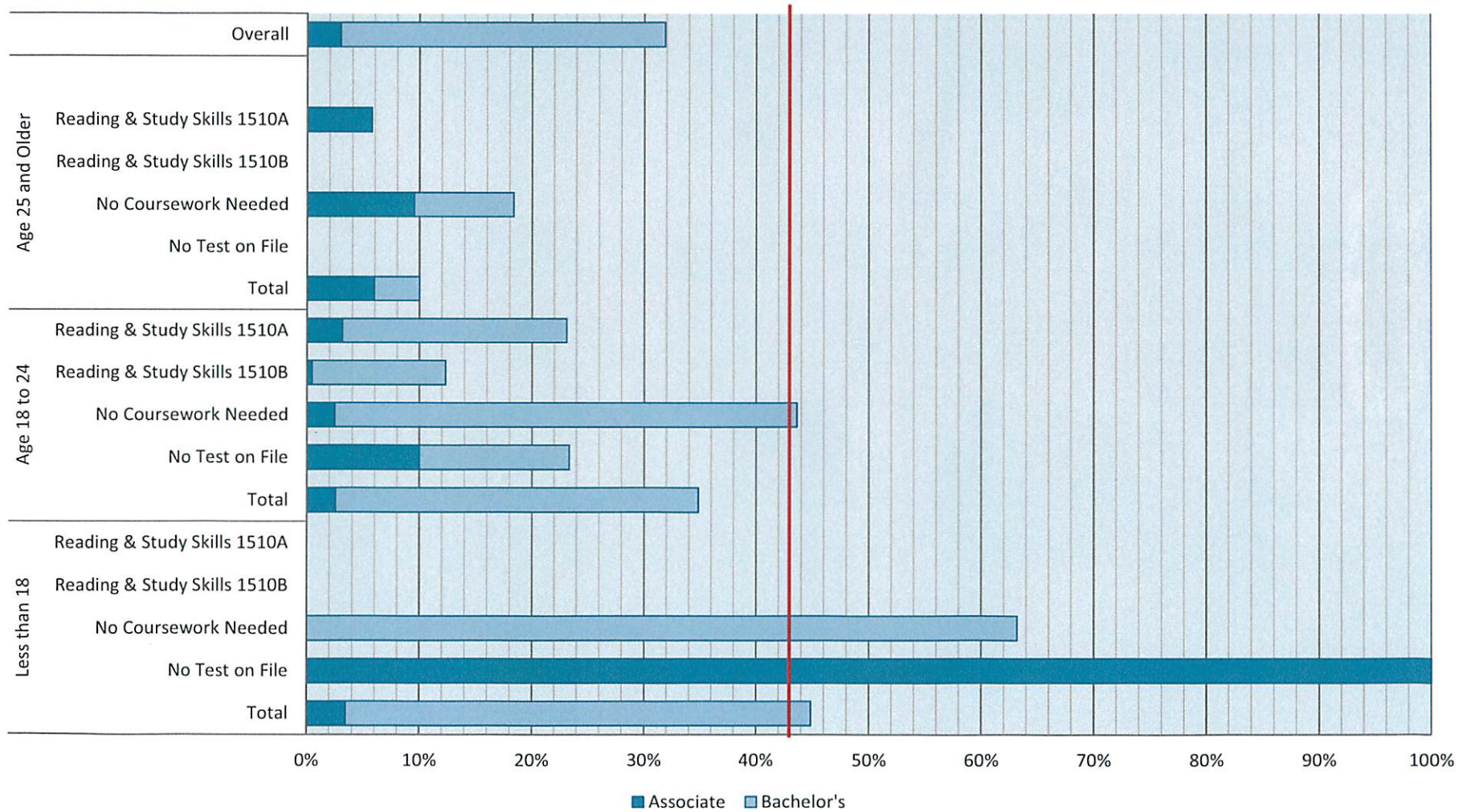
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by Age Group and English Placement Recommendation

**Overall
2020 Goal = 43%**



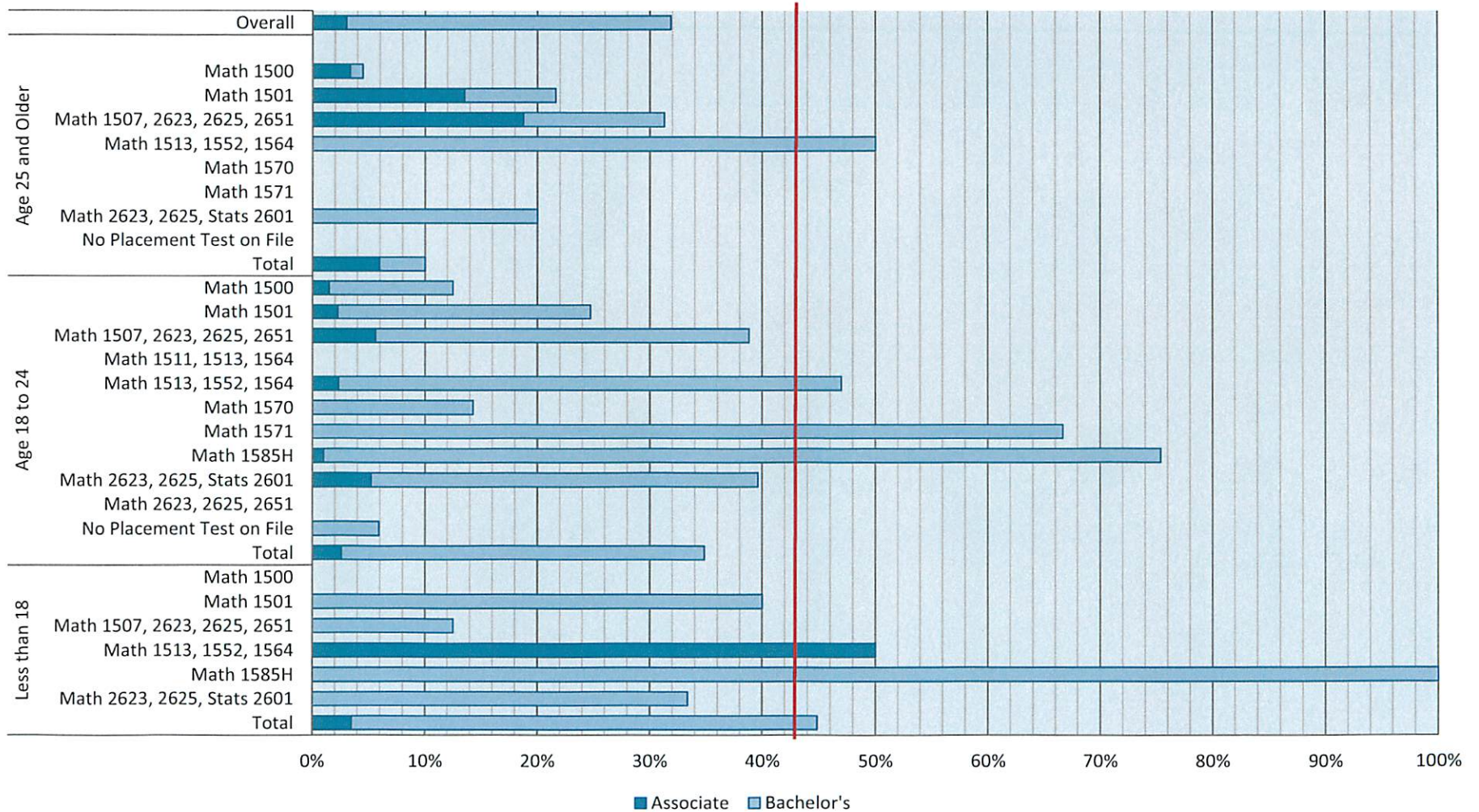
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by Age Group and Reading & Study Skills Recommendation

Overall
2020 Goal = 43%



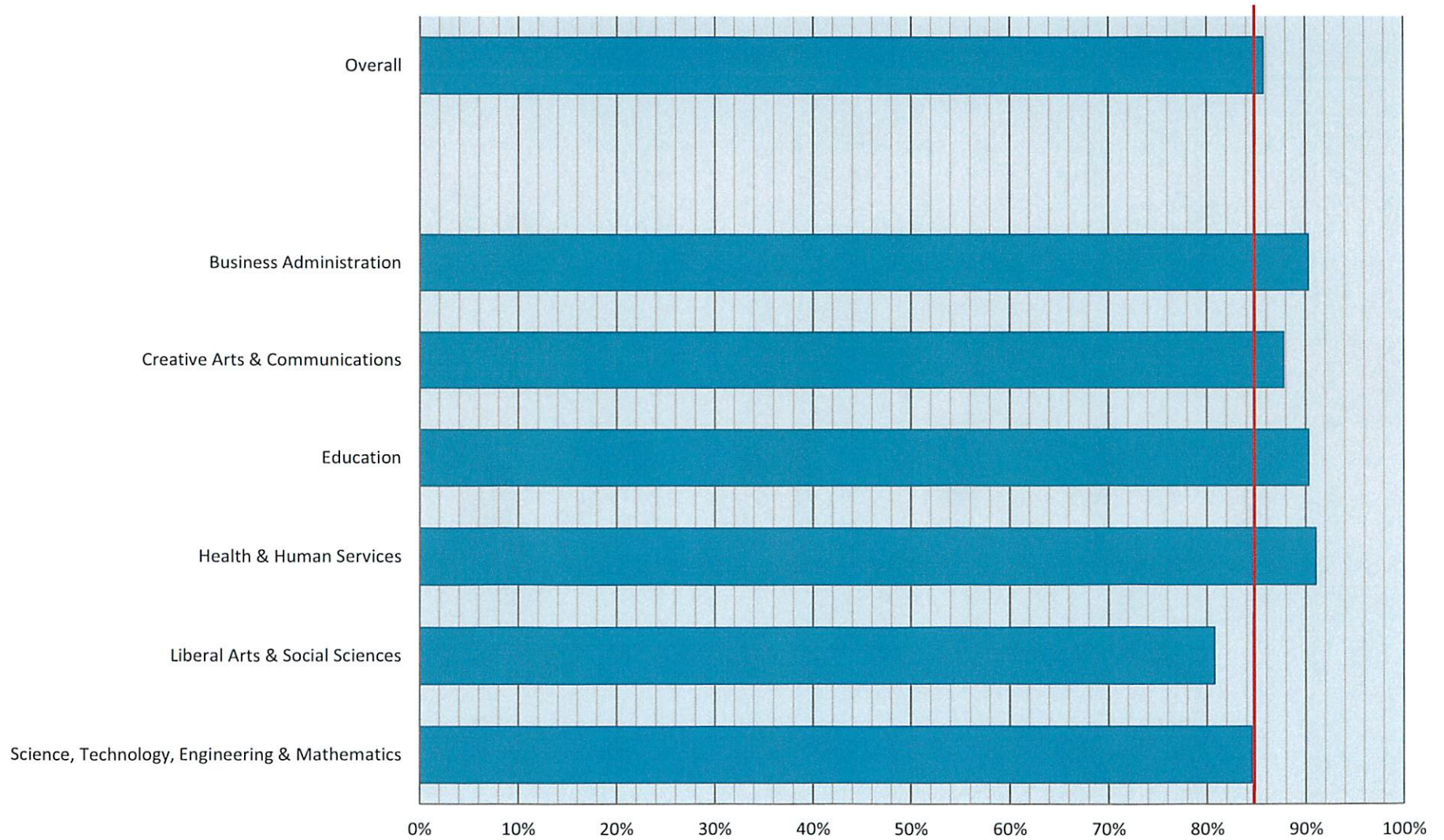
Youngstown State University 2009 First-Time, Full-Time Degree Seeking Undergraduate Six-Year Graduation Rates by Age Group and Math Placement Recommendation

Overall
2020 Goal = 43%



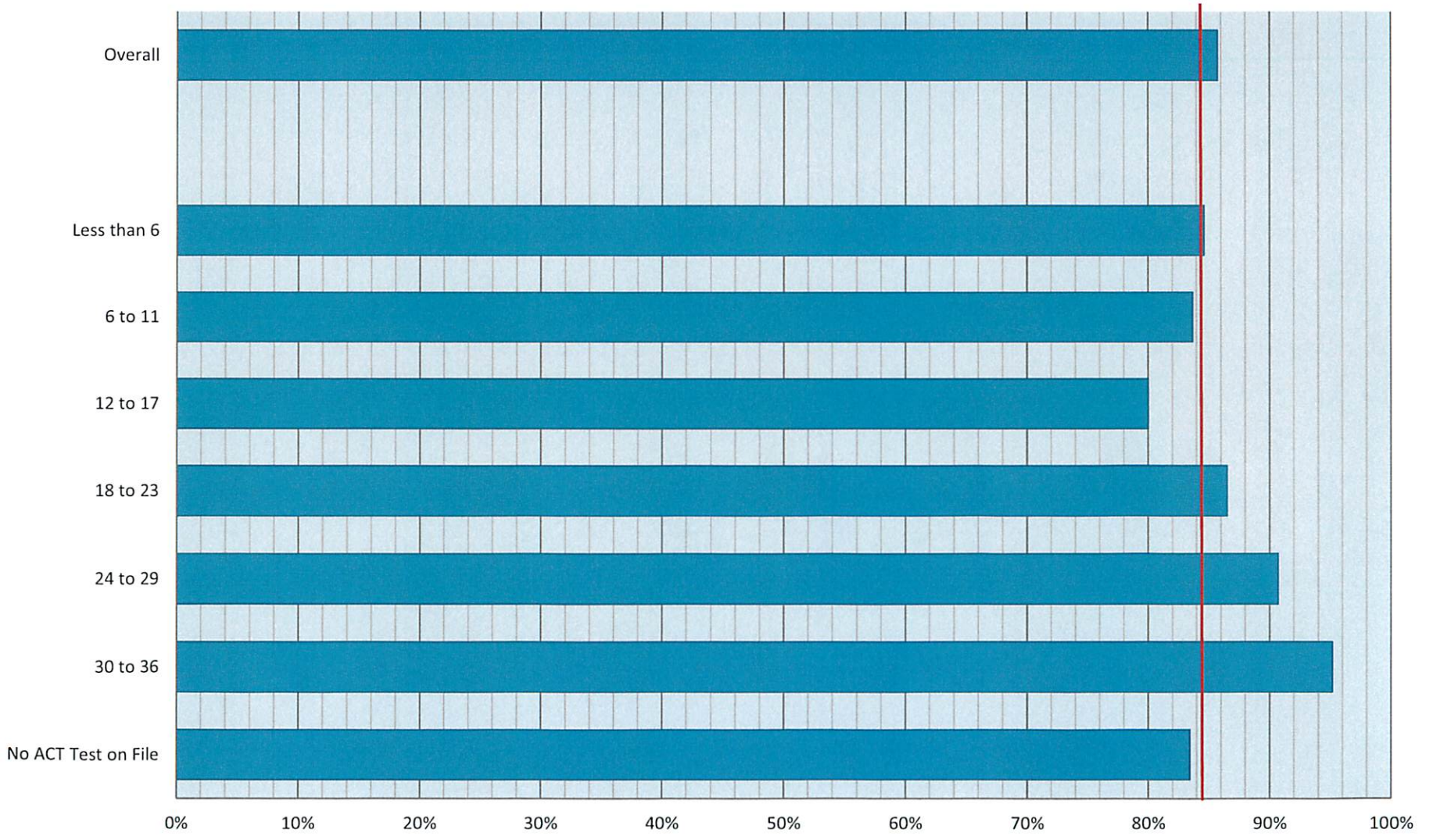
Youngstown State University Fall 2014 Undergraduate Course Completion Rates by College of Course

Overall
2020 Goal = 85%



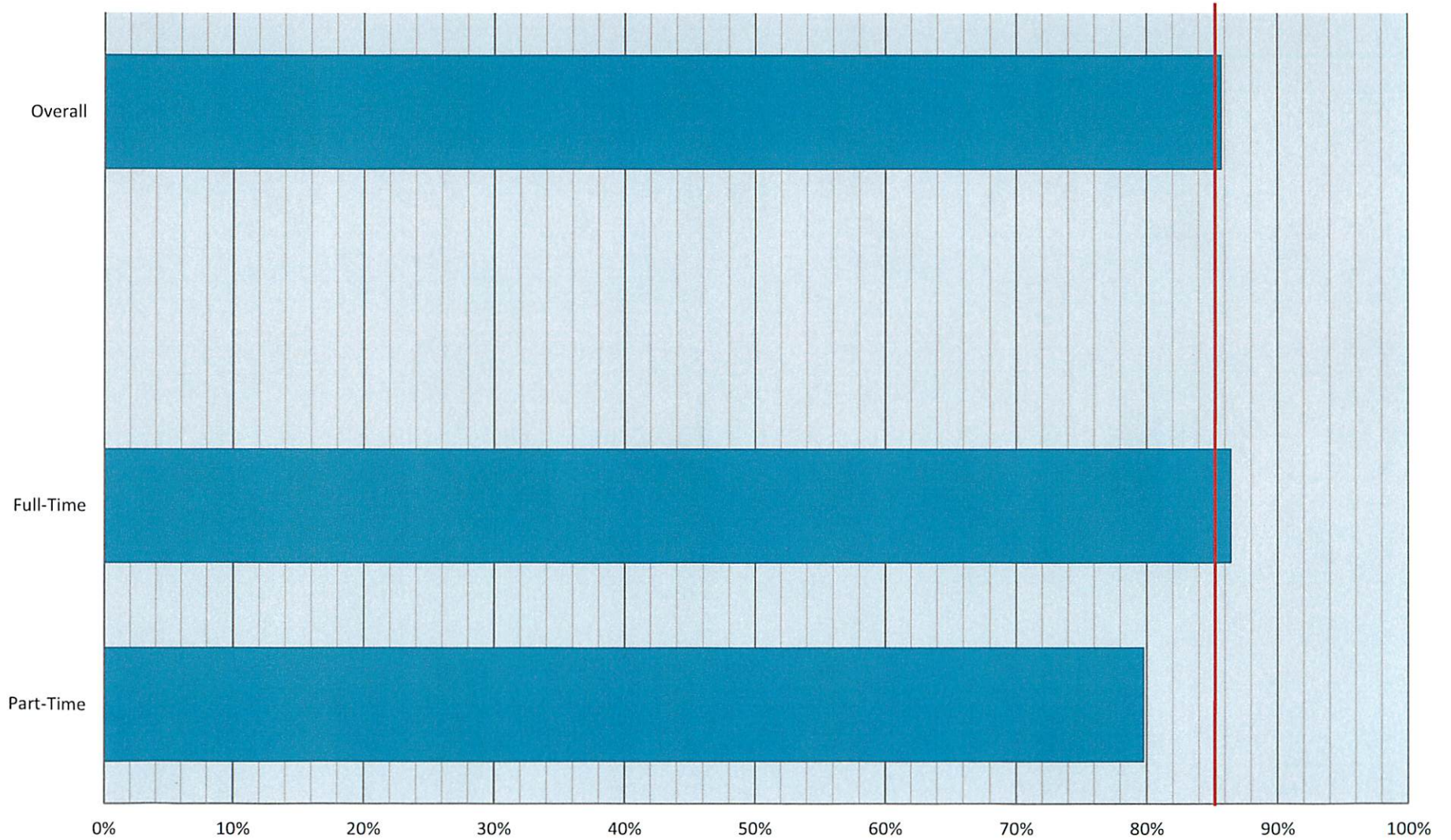
Youngstown State University Fall 2014 Undergraduate Course Completion Rates by ACT Composite Score Range

Overall
2020 Goal = 85%



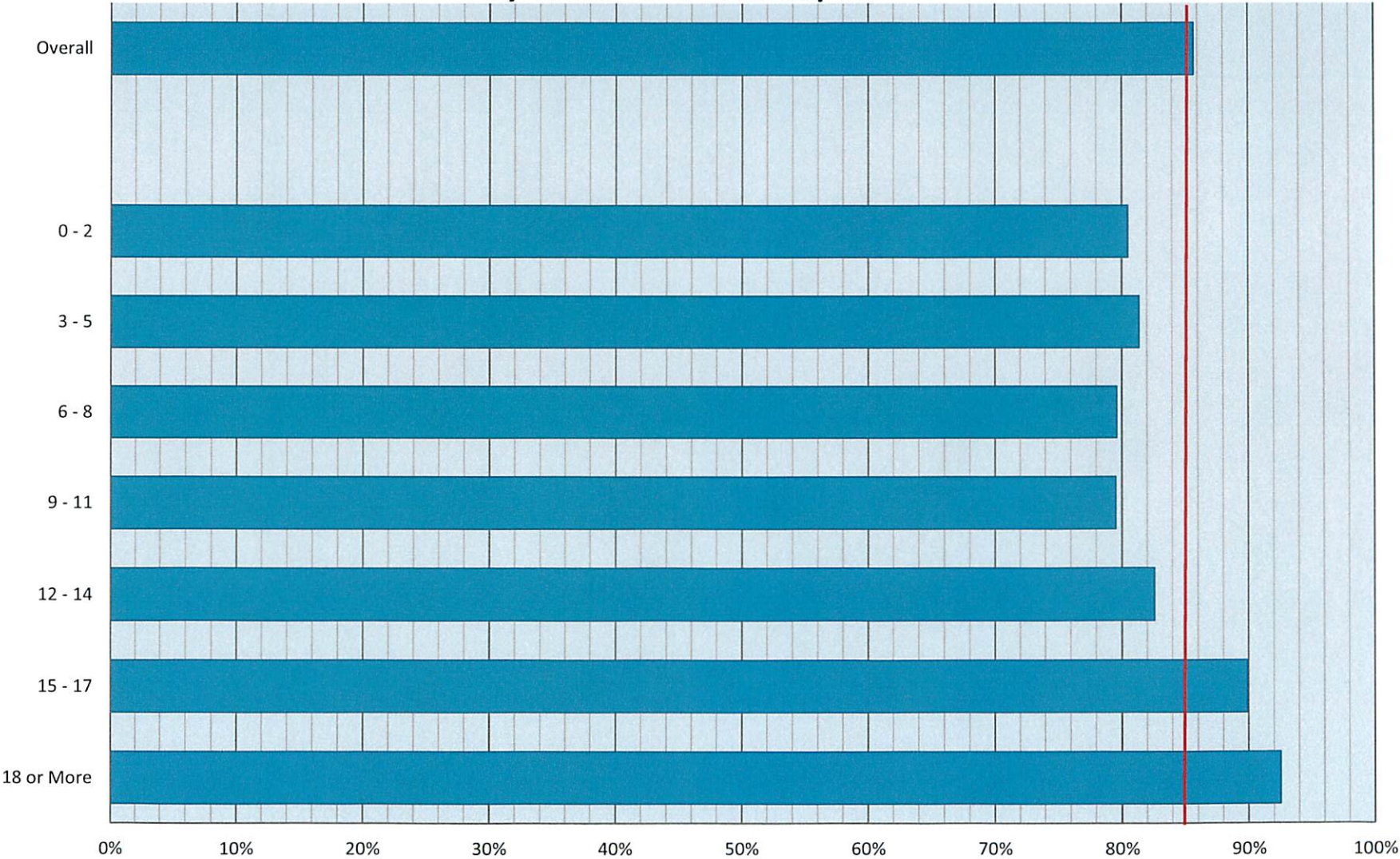
Youngstown State University Fall 2014 Undergraduate Course Completion Rates by Academic Load

Overall
2020 Goal = 85%



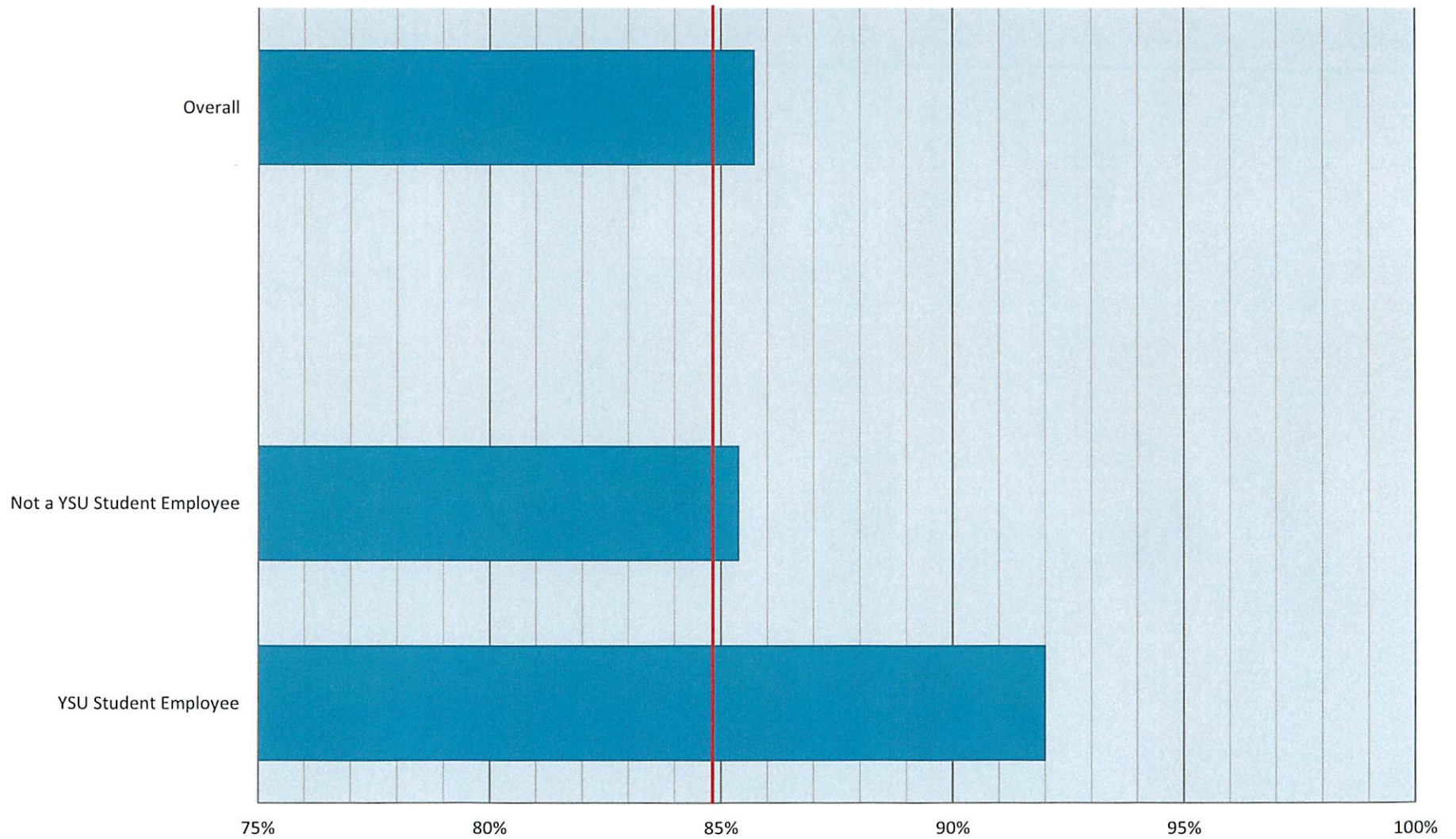
Youngstown State University Fall 2014 Undergraduate Course Completion Rates by Credit Hours Attempted

Overall
2020 Goal = 85%



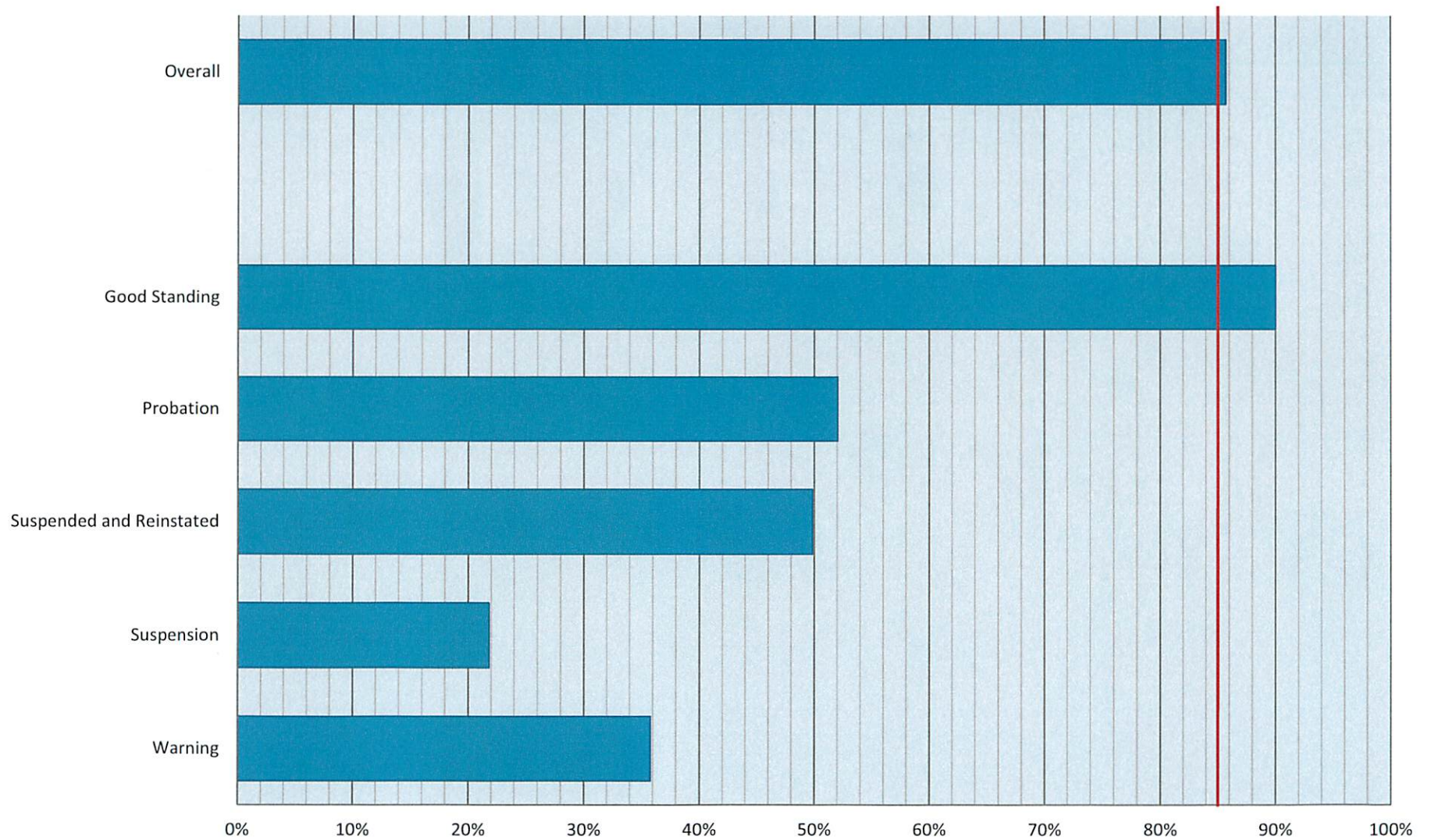
Youngstown State University Fall 2014 Undergraduate Course Completion Rates by Fall 2014 YSU Student Employee

Overall
2020 Goal = 85%



Youngstown State University Fall 2014 Undergraduate Course Completion Rates by End-of-Term Academic Standing

Overall
2020 Goal = 85%



Youngstown State University Fall 2014 Undergraduate Course Completion Rates by Race/Ethnicity

Overall
2020 Goal = 85%



Youngstown State University 2014 First-Time Undergraduate Degree Seeking Fall-to-Fall Persistence Rates by Fall 2014 Academic Load

Overall
2020 Goal = 72%

