

Pandemic-Period Changes in Enrollment and Success Among Young Adults at Tennessee Community Colleges

TBR | The College System of Tennessee

The COVID-19 pandemic disrupted the path to postsecondary enrollment and success for many young adults in Tennessee. These disruptions significantly affected first-time enrollment at the state's 13 open-access community colleges. From fall 2019 to fall 2022, first-time enrollment by recent high school graduates fell 21%. Then, among students who overcame the barriers to enrollment during the pandemic, Tennessee community colleges saw significant declines in key measures of students' momentum during their first year of college.

Now, Tennessee community colleges are bouncing back after three years of declines in enrollment and success. In 2023, TBR—The College System of Tennessee published a set of interactive reports and dashboards that examine pandemic-era outcomes at community colleges across the state. These tools put the spotlight on areas of continued challenges, including low persistence rates for students of color and academically underprepared students. However, these tools also identify metrics where recent student success rates have bounced back or exceeded pre-pandemic trends.

This brief describes the pandemic-period changes in enrollment and student success for young adult students at Tennessee's 13 community colleges. After identifying areas where community colleges have bounced back and areas of ongoing challenges, this brief concludes with a description of new projects and tools designed to help the system promote pandemic recovery.

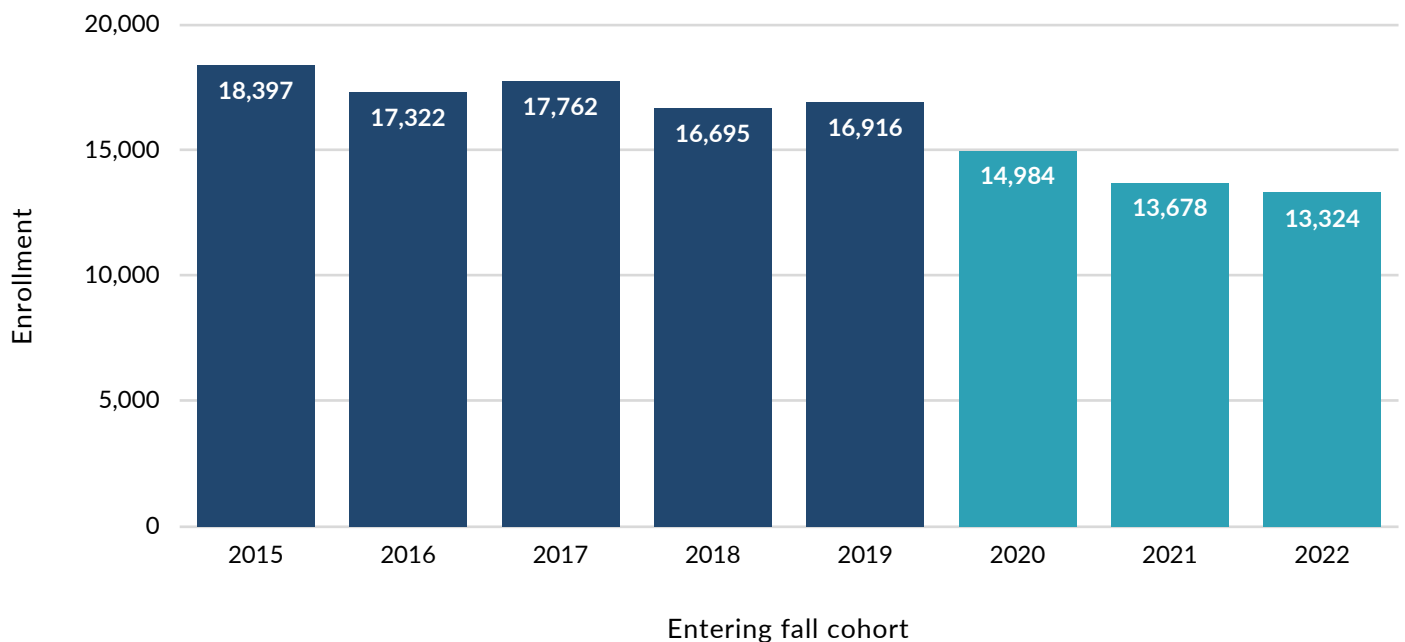
Tennessee's 13 community colleges are bouncing back after three years of declines in enrollment and success, but challenges remain.

Enrollment at Community Colleges Declined During the Pandemic

First-time enrollment by recent high school graduates at Tennessee community colleges declined after the onset of the pandemic.¹ From fall 2019 to fall 2020, first-time enrollment at community colleges by recent high school graduates declined 11%. This meant 1,900 fewer recent high school graduates enrolled at Tennessee community colleges in fall 2020 than in fall 2019.

The pandemic-era declines in enrollment at Tennessee community colleges initially followed national trends, as other states experienced declines in community college enrollment after the onset of the pandemic (National Student Clearinghouse Research Center, 2023). However, while enrollment at community colleges began to bounce back in 2022, first-time enrollment at Tennessee community colleges continued declining. Overall, first-time enrollment by recent high school graduates fell 21% from 2019 to 2022. In other words, nearly 3,600 fewer students enrolled in fall 2022 than in fall 2019.

Figure 1. First-Time Enrollment at Tennessee Community Colleges



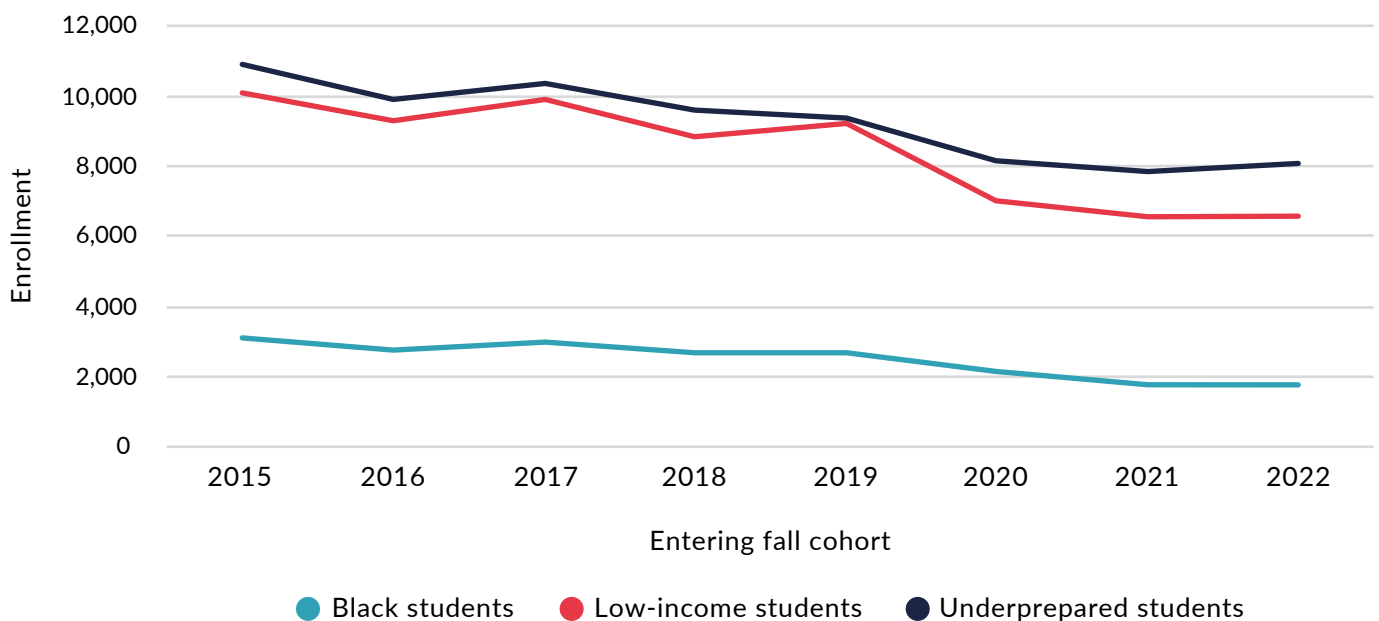
Note. Analysis based on end-of-term data from the TBR student information system. First-time enrollment includes students who enrolled as first-time freshmen in the fall cohort and enrolled within one year of high school graduation.

Notably, these pandemic-era declines exacerbated a downward trend in enrollment that began before the onset of COVID-19. In the four years before the pandemic, community college enrollment in Tennessee followed a slight downward trend. First-time enrollment at community colleges peaked in the fall of 2015 with the launch of Tennessee Promise, a statewide last-dollar scholarship that allowed recent high school graduates to attend community colleges tuition-free. From 2016 to 2019, first-time enrollment declined slightly after the initial impact of the Promise program. In the immediate wake of the pandemic in 2020, enrollment declined more sharply. Although enrollment trended downward before COVID-19, the decline in 2020 quadrupled the size of the pre-COVID downward trend.

These declines were even steeper for some student groups. Enrollment by low-income students and students of color declined most steeply.² Among Black and African American students, first-time enrollment fell 34% from 2019 to 2022. Among low-income students, enrollment fell 28% from 2019 to 2022.

Declines also differed based on students' academic preparation for college-level coursework. However, these declines evolved throughout the pandemic. In 2022, enrollment fell 13% for underprepared students, a steeper decline than for students overall. However, as the pandemic progressed in 2021 and 2022, enrollment by underprepared students fell more slowly than enrollment by more prepared students.³

Figure 2. First-Time Enrollment at Tennessee Community Colleges by Student Group



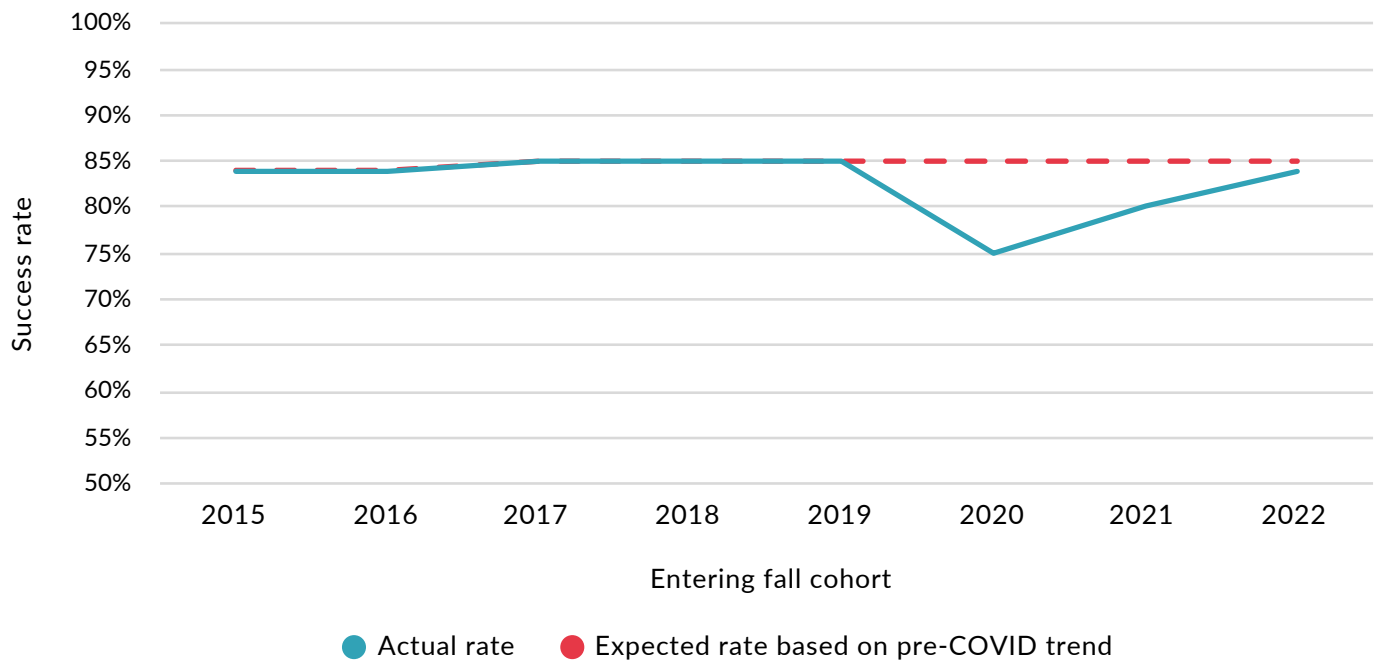
Note. First-time enrollment includes students who enrolled as first-time freshmen in the fall cohort and enrolled within one year of high school graduation.

Fewer Students Reached Important Milestones During Their First Year of College

While the decline in college-going received significant attention across the state, the declines in student success during the pandemic received less attention.⁴ During the first two years of the pandemic, student success rates for first-time students also declined, especially on important indicators of the momentum students build during their first year of college toward completing a postsecondary credential (Belfield et al., 2019). After the onset of the pandemic, fewer students earned credit in their first semester, completed important gateway courses, and persisted to their second year of college.

Fewer students earned college credit in their first semester. Earning credit in the first semester of enrollment is an important early indicator of students' momentum toward success at community colleges. In the five years before the pandemic, credit attainment rates were very stable, as 84% of first-time students each year earned any college credit in their first semester. After the start of the pandemic, the proportion of first-time students at Tennessee community colleges earning credit during their first semester fell. In fall 2019 (before the pandemic), 84% of first-time students earned credit in their first semester of enrollment. Credit attainment rose slightly for students who entered college during the second year of the pandemic in fall 2021. However, it remained below pre-COVID levels at 81%.

Figure 3. Students Who Earned Credit in Their First Semester



Note. The credit attainment rate is calculated based on the proportion of the entering fall cohort who earned college-level or remedial credit during their first fall semester. Expected rates based on pre-COVID trends are estimated using an interrupted time series analysis.⁵

Fewer students passed important introductory courses. Much like credit attainment, completing gateway courses (i.e., college-level general education entry courses) is also an early indicator of students' momentum toward success. However, the proportion of students completing gateway math and writing courses in their first year fell after the start of the pandemic.

In math, gateway course success rates fell in the first year of the pandemic. For students who began college in the fall of 2019, 56% passed a gateway math course by the end of their first year of college. Among fall 2020 new enrollees, only 50% passed a gateway math course. As the pandemic progressed, gateway math success increased slightly among students who enrolled for the first time in 2021 but remained under the pre-pandemic levels at 53%.

In writing, gateway course success rates also fell after the pandemic began. Among students who began college in the fall of 2019, 67% passed a gateway writing course by the end of their first year. Among fall 2020 new enrollees, this fell to 59%. Like in math, gateway writing success increased slightly among students who enrolled for the first time in 2021 but remained under the pre-pandemic levels at 63%.

Notably, the proportion of students completing a gateway math or writing course by the end of their first year declined slightly even before the onset of the COVID-19 pandemic. Gateway course completion rates peaked in 2015 and 2016, shortly after the systemwide implementation of math pathways reforms, corequisite learning support, and other efforts to promote gateway course success (Ran & Lin, 2022). However, gateway course completion rates began to fall in 2017, and this downward trend continued through 2019. After the start of the pandemic, this downward trend accelerated.

Figure 4. Students Who Passed a Gateway Math Course in Their First Year

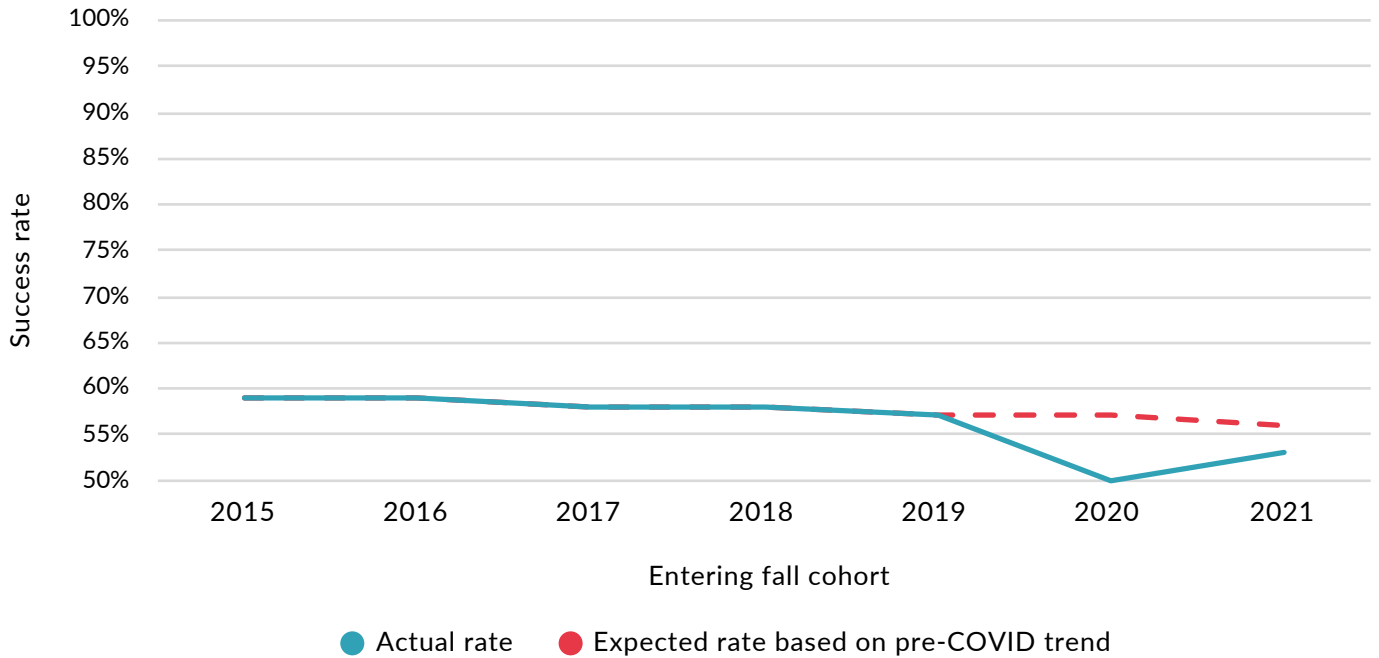
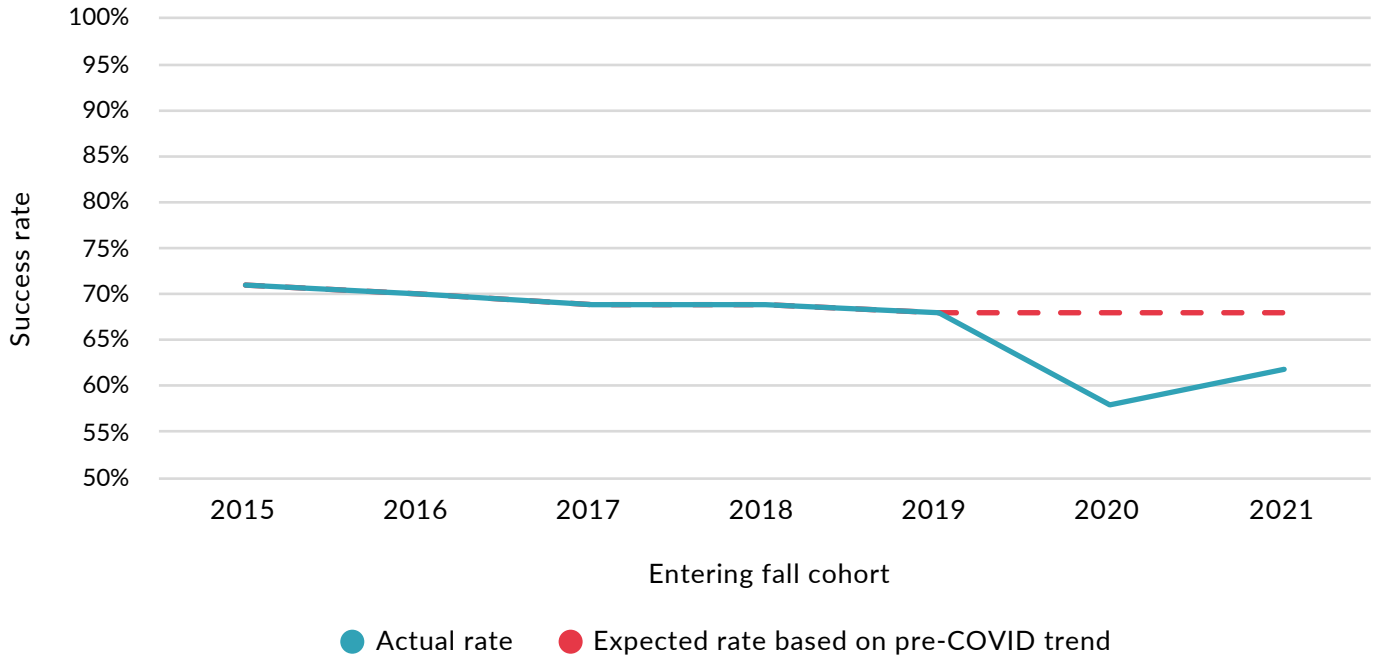


Figure 5. Students Who Passed a Gateway Writing Course in Their First Year



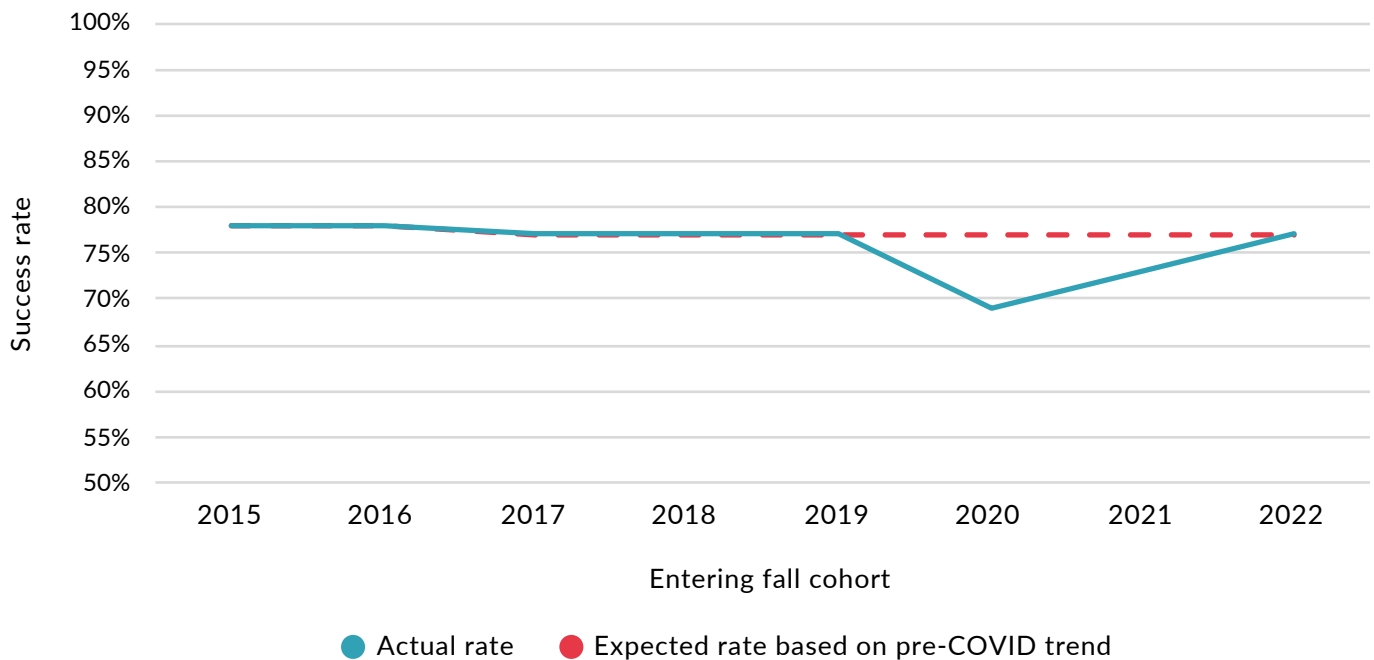
Note. Gateway course success rates are calculated based on the proportion of the entering fall cohort who earned a grade of D or better in 1000-level math or writing courses during their first year of college. Expected rates based on pre-COVID trends are estimated using an interrupted time series analysis.

Fewer students persisted from their first to the second semester of college.

Before the pandemic, three quarters of first-time students persisted from fall (their first semester) to spring (their second semester), and persistence rates showed no clear upward or downward trends from 2015 to 2019. After the onset of the pandemic, persistence rates fell significantly. These declines were especially steep for Black and academically underprepared students.

The proportion of students persisting from fall (their first semester) to spring (their second semester) declined for students who enrolled in college for the first time in fall 2020. Among students who first enrolled in the fall of 2019, 77% persisted from fall to spring. Among students who first enrolled in fall 2020, fall-to-spring persistence fell 7 percentage points to 69%. Like other early momentum indicators, fall-to-spring persistence rates improved slightly for the 2021 cohort. However, these rates remained below the pre-pandemic levels at 74%.

Figure 6. Students Who Persisted to Their Second Semester



Note. The fall-to-spring persistence rate is calculated based on the proportion of the entering fall cohort who returned in the following spring term or earned a technical certificate or associate degree before the start of the spring term. Expected rates based on pre-COVID trends are estimated using an interrupted time series analysis.

Tennessee Community Colleges Are Bouncing Back, But Some Challenges Persist

By the fall of 2022, Tennessee community colleges began to show signs of pandemic recovery, especially on indicators of early student success. Credit attainment rates, gateway course completion rates, and persistence rates returned to pre-COVID levels.

However, on other measures, community colleges in Tennessee are still experiencing pandemic-related effects. In fall 2022, first-time enrollment by recent high school graduates declined further, and early data from fall 2023 enrollment point toward continued declines. Also, while success rates have bounced back on many indicators of student success, early momentum indicators still lag for several student subgroups.

Black Students

Since the pandemic's start, first-time enrollment by Black and African American students has fallen 14%. Cumulatively, from 2020 to 2022, this meant 1,725 fewer Black students enrolled than might have enrolled based on pre-COVID trends.

Additionally, Black students experienced some of the most significant declines in early momentum indicators during the pandemic. Credit attainment rates by Black students lagged behind other groups even before COVID-19. After the onset of the pandemic, the proportion of Black students earning credit in their first semester fell 17 percentage points, from 80% among first-time students in 2019 to 63% among first-time students in fall 2020. During the pandemic, Black students experienced steeper declines in gateway course success and persistence rates than other students. Even while success rates for other groups began to bounce back, persistence rates further declined for Black students in 2021 and 2022.

Low-Income Students

COVID-era enrollment declines were steeper among low-income students than among other student groups. During the pandemic, first-time enrollment by low-income students fell 28%. Cumulatively, this meant 6,030 fewer low-income students enrolled during the pandemic-era cohorts than we might have expected based on pre-COVID trends. Additionally, success rates were slower to bounce back among low-income students than other students. While gateway course success and persistence rates returned to pre-COVID levels by 2022, these measures of early momentum were slower to recover among low-income students than for other students.

Underprepared Students

During the pandemic years of 2020–2022, 2,076 fewer underprepared students enrolled than we might have expected based on pre-COVID trends. Among underprepared students who did enroll, rates of credit attainment and gateway course success dropped significantly. In the first year of the pandemic, only 39% of underprepared students completed a gateway math course, compared to half of underprepared students before the pandemic. Even as success rates began to recover for prepared students, gateway course success rates and persistence rates for underprepared students lagged behind pre-COVID levels for underprepared students in 2021 and 2022.

Looking Ahead

TBR—The College System of Tennessee serves as the governing board and comprehensive college system for the state’s community colleges. To help shed light on the pandemic impact and support pandemic recovery, TBR released two new tools in 2023:

- An interactive policy brief called [Bouncing Back: Student Success and Pandemic Recovery for Young Adults at Tennessee Community Colleges](#). This policy brief explores pandemic-era trends in community college enrollment and success. It features early indicators of success for Black students, low-income students, and academically underprepared students.
- An interactive dashboard that allows colleges and K-12 districts to examine pandemic-era outcomes at community colleges for students in their region. [The High School to College Pathway dashboard](#) allows users to view enrollment trends, first-year student success, and longer term outcomes for young adults at community colleges before and after the pandemic. The tool allows users to filter the data to see granular information by the district or high school where students graduated.

In addition to these new tools, TBR developed two initiatives in partnership with community colleges to support students affected by the pandemic and reimagine the post-pandemic community college experience:

- In fall 2022, TBR worked with two Tennessee community colleges to launch a new project to support academically underprepared students who graduated from high school during the pandemic. Through the [Tennessee Coaching Project](#), colleges are embedding coaches into students’ corequisite learning support experiences to enhance support for students who may have experienced COVID-related learning loss or other challenges during the pandemic. Early results suggest that coaching is helping students persist and build momentum toward graduation.⁶

- In fall 2023, TBR worked with four Tennessee community colleges to launch a new pilot effort to improve student success through more extensive career exploration, ongoing career advising, and a workforce-focused certificate in a student's first semester. Through [Reimagining the Community College Experience](#), colleges are building embedded, stackable certificates into associate degree programs to connect students' academic experiences with economic opportunities in their communities.

Endnotes

1. The College System of Tennessee is the state's largest public higher education system, with 13 community colleges, 24 colleges of applied technology, and the online TN eCampus serving approximately 120,000 students each year. The system is governed by the [Tennessee Board of Regents \(TBR\)](#). Additional data and research about Tennessee community colleges can be found at tbr.edu/data.
2. For this brief, students are described as low-income students if they received a federal Pell Grant during their first fall term of enrollment.
3. Tennessee community college students are assessed upon enrolling. Students whose assessments fall below established cut scores are placed into corequisite learning support to support their success in college-level math, reading, or writing-based courses. For this brief, students are described as academically underprepared if they were placed into corequisite learning support for at least one course. TBR colleges began using high school GPA as an alternative placement method in the fall of 2020. However, placement based on high school GPA was not used to determine preparation for this analysis. Students in the 2020–2022 cohorts who bypassed learning support based on high school GPA were included among the underprepared students for this brief.
4. The Tennessee Higher Education Commission's annual report on the college-going rate provides an in-depth overview of statewide trends in postsecondary enrollment since the start of the pandemic. This report is available at <https://www.tn.gov/content/tn/thec/research/college-going-reports.html>.
5. Expected rates based on pre-COVID trends are estimated using an interrupted time series analysis. Additional details about this analysis are described in TBR's interactive policy brief [Bouncing Back: Student Success and Pandemic Recovery for Young Adults at Tennessee Community Colleges](#). A technical appendix within the interactive brief provides more information about this methodological approach.
6. Early results are available in TBR's interactive policy brief [The Tennessee Coaching Project: Enhancing Corequisite Learning Support with Success Coaching at Community Colleges](#).

References

Belfield, C., Jenkins, D., & Fink, J. (2019). *Early momentum metrics: Leading indicators for community college improvement*. Columbia University, Teachers College, Community College Research Center. <https://ccrc.tc.columbia.edu/publications/early-momentum-metrics-leading-indicators.html>

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For more information about the ARCC Network, visit ccrc.tc.columbia.edu/arccnetwork/

For more information on the Reengaging Tennessee Young Adults project, visit ccrc.tc.columbia.edu/arccnetwork/projects/reengaging-tennessee-adults/