LEVERAGING THE POTENTIAL OF COMMUNITY COLLEGES IN DATA-DRIVEN WORKFORCE DEVELOPMENT

TEXAS 2036

FEBRUARY 2023

TABLE OF CONTENTS

Leveraging the Potential of Community Colleges in Policy and Data-Driven Workforce Development

LEVERAGING THE POTENTIAL OF

Community Colleges in Policy and Data-driven Workforce Development

Key Highlights and Considerations

Texas community colleges are uniquely positioned to meet the state's growing demands for skilled labor through efficient, accessible, and affordable pathways for students to earn credentials and ultimately self-sustaining wages. These colleges fulfill a number of critical roles in our statewide education system and local communities, including providing technical and vocational programs, workforce development and certifications, continuing adult education and training, and adult literacy programs, all alongside traditional academic courses that introduce students to higher education and support them throughout their career trajectories. Texas has 50 independent community college districts that deliver open enrollment education and workforce training opportunities to an average of about 700,000 students of all ages and backgrounds every year, including those in high school or in a career transition. In short, community colleges can be a significant part of state solutions to the growing postsecondary education and workforce training needs in Texas if financed adequately and appropriately—in a way that incentivizes student outcomes and aligns with the Building a Talent Strong Texas state strategic plan.

In the current model, **Texas community colleges are financed** through varying proportions of the following:

- **State funds** based on formulas for two-year institutions (4% for core operations; 79%
- **Local tax revenues** from property taxes to fund maintenance, operations, and capital projects.
- **Tuition and fees** charged to students, determined by each college district.

The passage Senate Bill 1230 (87-R) in 2021 and the subsequent formation of the Texas Commission on Community College Finance (the Commission) has increased attention and focus on how these public institutions are financed and how to better support them to reach desired state education and workforce outcomes. Texas 2036 has been a key partner in refining this focus and offering practical support in the Commission's process. In 2021 and 2022, Texas 2036 took the opportunity to engage more than 40 community college leaders, experts, and researchers as well as consult existing data sources and policy research to enhance public understanding of the pivotal role community colleges can play, to elucidate the barriers related to data and finance faced by colleges, and to develop and test an interactive Community College Finance Simulator that accurately portrays how the finance system works today—and how it can be improved for the future to increase funding predictability and return on investment.

We have identified the following **five key findings** that offer opportunities to reform community college finance so that student outcomes improve in ways that draw upon colleges' strengths and acknowledge their complexities.

1. **Community colleges need better predictability in their funding models in order to adequately plan and align with the state's higher education and workforce goals.** The current allocation model for state funding has limited predictability.
2. **Acknowledging economies of scale between community college districts can help ensure students statewide have equitable access to postsecondary opportunities.** In part, this involves attention to the wide variability in local resources that fund community colleges and affect the programs, services, and resources available to individual students in different parts of the state.
3. **Community college students are not achieving the outcomes important to meeting state higher education goals and workforce needs.** The current finance system is not set up to adequately incentivize those outcomes; we must clearly define and incentivize the education and workforce aims Texas is working to achieve.
4. **Community colleges can better serve student needs with improved data confirming the value of credential offerings.** Strategic solutions are needed to improve current data collection and use.
5. **A customizable community college finance simulator can strengthen and streamline the process for considering state finance system reforms.**

The analysis that follows offers additional insight into the value of community colleges in Texas workforce development, the existing and needed data collection and transparency on return on investment and student outcomes in high-demand fields, and the implications for this current moment in finance reform in the state.

With the potential to impact hundreds of thousands of Texans in the higher education and workforce pipeline each year—at least 45% of the higher education student population—community colleges play a central role in the future of our state.

The Value of Community Colleges

In order to best leverage the potential of Texas community colleges and incentivize their alignment and partnership in achieving state workforce and higher education goals, it is important to understand the roles community colleges fulfill, the ways in which they are financed, their student outcomes, and the existing opportunities for better access to relevant and quality data to drive strategic improvements and benchmark progress.

Building Talent, Delivering Value

Community colleges can build talent while delivering value strategically and equitably in Texas. They have a clear role to play alongside other institutions of higher education and workforce training/certification providers. In 2022, the Texas Higher Education Coordinating Board released a refreshed strategic plan for all higher education in the state entitled "Building a Talent Strong Texas" (BTST), which reinforced the need to develop a homegrown, skilled, and career-ready workforce. The new plan builds on the successes of the state's previous plan, 60x30TX, by widening the lens for higher education to include all working-age Texans in its educational attainment goal by 2030.

The Pivot to Credentials of Value

Building a Talent Strong Texas, the state higher education strategic plan for 2022–2030, established an inspirational and aspirational goal:

60% of Texans ages 25–34 and 35-64, respectively, will have a degree, certificate, or other postsecondary credential of value by 2030.

A credential of value positions an individual for employment with a data-backed wage premium that is higher than typical wages of high school graduates while keeping their education debt reasonable.

Meeting Current and Future Workforce Needs

The pivot to credentials of value is important due to the incorporation of labor market needs into higher education as a value metric. These credentials have a wage premium that ensures a Texan is better off financially for having pursued higher education and is able to reasonably pay off the cost of their education as well. Given how the value of a high school diploma has plummeted, higher education is critical to attaining good jobs. As of 2018, 54% of all Texas jobs require postsecondary education or training beyond high school but less than a bachelor's degree. These include jobs in growing industries such as health care, medical technology, IT and software, and advanced manufacturing—as well as a demand for tradespeople like plumbers and electricians. These are considered middle-skill jobs; only 45% of Texans are sufficiently trained. Thus, Texas has a 9% "middle skills gap" comprised of roughly 1.4 million Texans. [1,2]

The Value of a High School Diploma is in Sharp Decline

The rate of Texans with only a high school diploma in a high-wage job earning $65,000 or more annually fell from 51% to 11% between 2011 and 2019.
(Source: Bureau of Labor Statistics and Texas Workforce Commission)

1 National Skills Coalition (2020). *The Texas skills mismatch* [fact sheet]. https://nationalskillscoalition.org/skills-mismatch/texas-skills-mismatch/

2 Texas Workforce Commission. (2021, November 18). *TWC Chairman Bryan Daniel testifies on how community college innovation can address the middle skills gap.* https://www.twc.texas.gov/news/twc-chairman-bryan-daniel-testifies-how-community-college-innovation-can-address-middle-skills-gap

Looking ahead, by 2030, 62% of all Texas jobs will require education or training after high school, [3] yet only 47.9% of Texans today have earned a postsecondary credential of any kind. [4] This ranks Texas as last among its 12 peer states [5] in terms of degree attainment for adults aged 25–64. [6] As for the state's long-term workforce pipeline, only about one out of four Texas high school graduates has obtained a postsecondary credential within six years of graduation. [7] Given workforce demands, more Texans will need to earn a credential beyond a high school diploma to meaningfully participate in our state's economy and sustain themselves and their families.

Community colleges can be part of the answer to close the state's skills gap and help Texans take advantage of workforce opportunities. Many of their offerings align with industries of opportunity in the state. According to a 2022 study conducted for Texas 2036 by Alexander Research and Consulting, [8] five key *industries of opportunity* were identified in Texas, defined as those industries that are large, growing, and/or significant to the state's labor market:

- Healthcare
- Education
- Finance and Insurance
- Transportation and Warehousing
- Oil and Gas

For two-year institutions, 15 of the top 25 fields of study align with an industry of opportunity. And many credentials offered primarily by community colleges also align with an industry of opportunity—15 out of the top 25 certificate programs and 14 of the top 25 associate programs were aligned. As such, community colleges are positioned well to help meet the state's workforce demands and maintain the state's economic competitiveness.

Diverse and Accessible Enrollment

Texas community colleges are also some of the most accessible providers of higher education and workforce training—virtually any Texan can enroll in community college. Community college service areas cover the vast majority of the state (see map) and the Texas Education Code, Chapter 130 allows any Texan to pursue a community college degree or credentialing program.

Community colleges serve many students. As of Fall 2022, 45% of the 1,481,852 students enrolled in higher education in the state (excluding health-related institutions) were enrolled in community college (see Figure 1). Texas community colleges enrolled nearly 750,000 students in 2019 and, though there were enrollment declines during the pandemic, community colleges still enrolled more than 670,000 students in Fall 2020 and over 668,000 students in Fall 2021.

3 Washington, J. (2022, May 10). *College enrollment down with more Texas jobs to require more education in 10 years.* Retrieved November 2, 2022, from https://www.kxan.com/news/texas-politics/college-enrollment-down-with-62-of-texas-jobs-to-require-post-high-school-education-in-10-years/

4 Lumina Foundation. (2022). *A stronger nation: Learning beyond high school builds American talent* (Texas data). Retrieved November 2, 2022, from https://www.luminafoundation.org/stronger-nation/report/#/progress/state/TX

5 Texas 2036 has identified and tracks key indicators in Texas as compared to 12 peer states that are competitors for business and talent as well as similar in size. These are: California, Colorado, Florida, Georgia, Illinois, New York, North Carolina, Ohio, Pennsylvania, Virginia, and Washington

6 Lumina Foundation. (2022). A stronger nation: Learning beyond high school builds American talent (Texas data). Retrieved November 2, 2022, from https://www.luminafoundation.org/stronger-nation/report/#/progress/state/TX as cited in Texas 2036. (2020). *Shaping our future: A strategic framework for Texas.* (p. 38). https://tx2036prod.wpenginepowered.com/wp-content/uploads/2022/11/Texas-2036-2020-Strategic-Framework-Report.pdf

7 Texas Education Agency. (2021). *Annual report 2021*, p. 4. https://tea.texas.gov/sites/default/files/tea-annual-report-2021.pdf

8 Texas 2036 & Alexander Research and Consulting. (n.d.). [forthcoming research report].

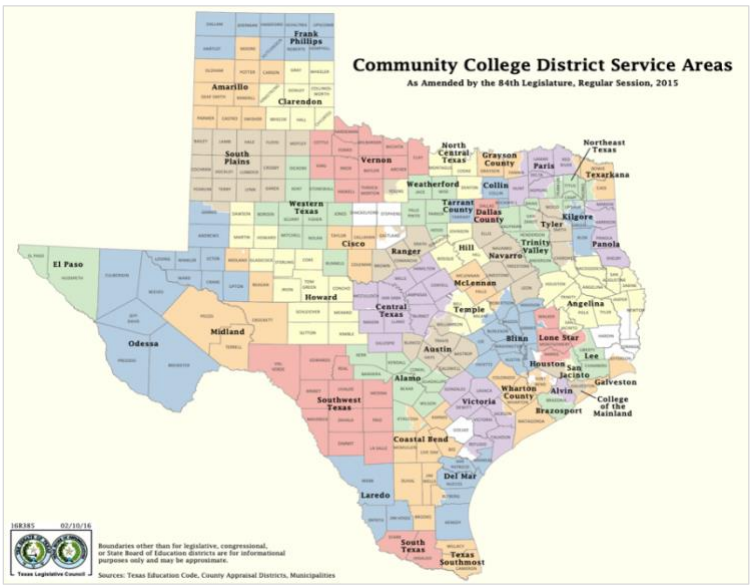
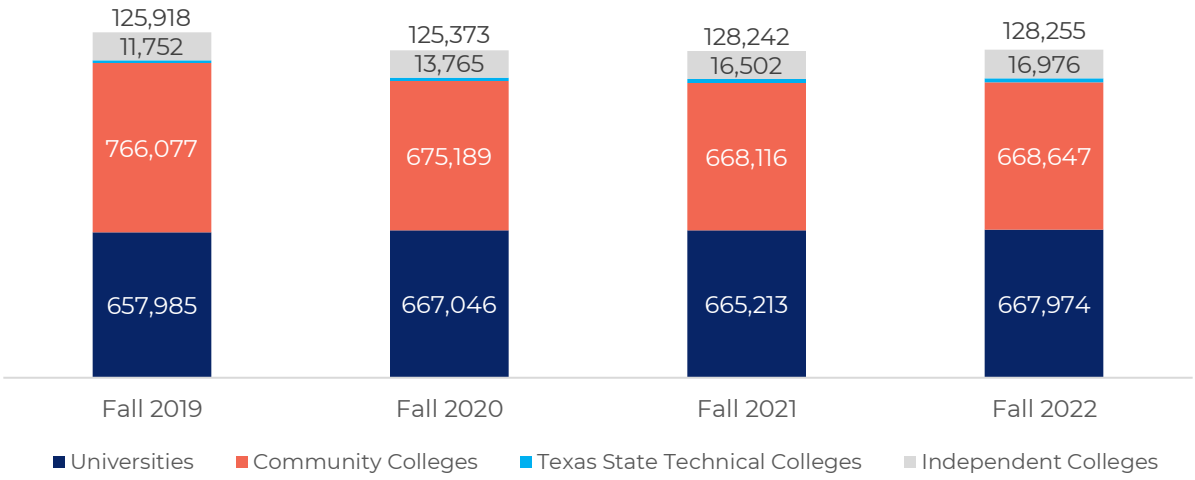


Figure 1. Texas Higher Education Fall Enrollment (2019–2022)[9]



Community colleges serve diverse students, including adolescents and adults of all ages and students with economic or academic disadvantages. Of all community college students enrolled the 2019–2020 academic year, 30.5% were considered economically disadvantaged with financial need defined by receipt of a Pell Grant, and 9.2% were considered academically disadvantaged because they did not meet required scores on any of the three TSI assessments at enrollment and were in need of developmental education. In that same year, 29.1% of community college students were adult learners aged 25 or above.

9 Texas Higher Education Coordinating Board. (2022). *Preliminary Fall 2022 Texas higher ed enrollment data.* Retrieved December 19, 2022, from http://www.txhighereddata.org/index.cfm?objectid=3A7438C0-570D-11ED-98CC0050560100A9

Finally, *Texas community colleges fulfill multiple roles and missions*, which allow them to serve Texans regardless of their career path or stage of education. As detailed in the callout box, these roles and missions tend to include focus on different groups of enrollees and types of training/education. Certain community colleges have a localized mission to prioritize certain programs or goals, and these localized missions differ among colleges (e.g., graduating students with short-term credentials; successful transfers of students to 4-year universities).

Honing the Focus on Student Outcomes

Given community colleges' varied roles, missions, and student populations, it is critical to intentionally outline target outcomes and indicators of success for each type of student enrolled. For instance, transfer students may need a coherent and rigorous sequence of courses that prepares them for a comprehensive university, while incumbent workers may need a short-term program focused on specific skills. By acknowledging that community colleges are both education and workforce training providers, Texas can systematically define desired outcomes that drive students to complete their community college education—*and ensure that students succeed in their next transition, whether that is to the workforce or further education.*

The Multiple Roles of Community Colleges

Community colleges offer accessible education to a range of adolescent and adult students, including, but not limited to:

- Dual credit education for high school students.
- Associate degree and workforce credential programs.
- General higher education coursework and preparation for success at four-year institutions.
- Apprenticeships and industry-specific programs.
- Training and personal/professional development to reskill or upskill adult learners.

Opportunities exist to better align community college student outcomes—and funding tied to those outcomes—with the state's overarching higher education goals. The contributions of Texas community colleges will play a crucial role in accomplishing the goals of BTST and meeting workforce demands in the state with an eye on equity and returns on investments for students and employers. For instance, the Commission is recommending significant incentives to colleges that successfully graduate students with a credential of value or a credential of value specifically linked to a high-demand field as well as incentives for successful transfer of a community college student to a comprehensive university.[10] This focus on outcomes, then, translates to material workforce and education value for all Texas community college students, regardless of their age or background.

In sum, community colleges have three main strengths:

1. Their education programs align with known workforce needs.
2. They offer accessible, open enrollment to all Texans.
3. They can highlight and work toward a range of outcomes to benefit students of all ages, backgrounds, and career trajectories.

Reforms through the state's finance system can help to ensure Texas community colleges are uniformly organized around higher education goals and workforce needs. State leaders can maximize workforce-linked student outcomes and return on investment while easing financial burdens on taxpayers by investing in community colleges.

10 Texas Commission on Community College Finance. (2022). *Report to the 88th Legislature*. https://reportcenter.highered.texas.gov/meeting/advisory-committee-supporting-documents/txcccf-final-report-to-the-88th-legislature/

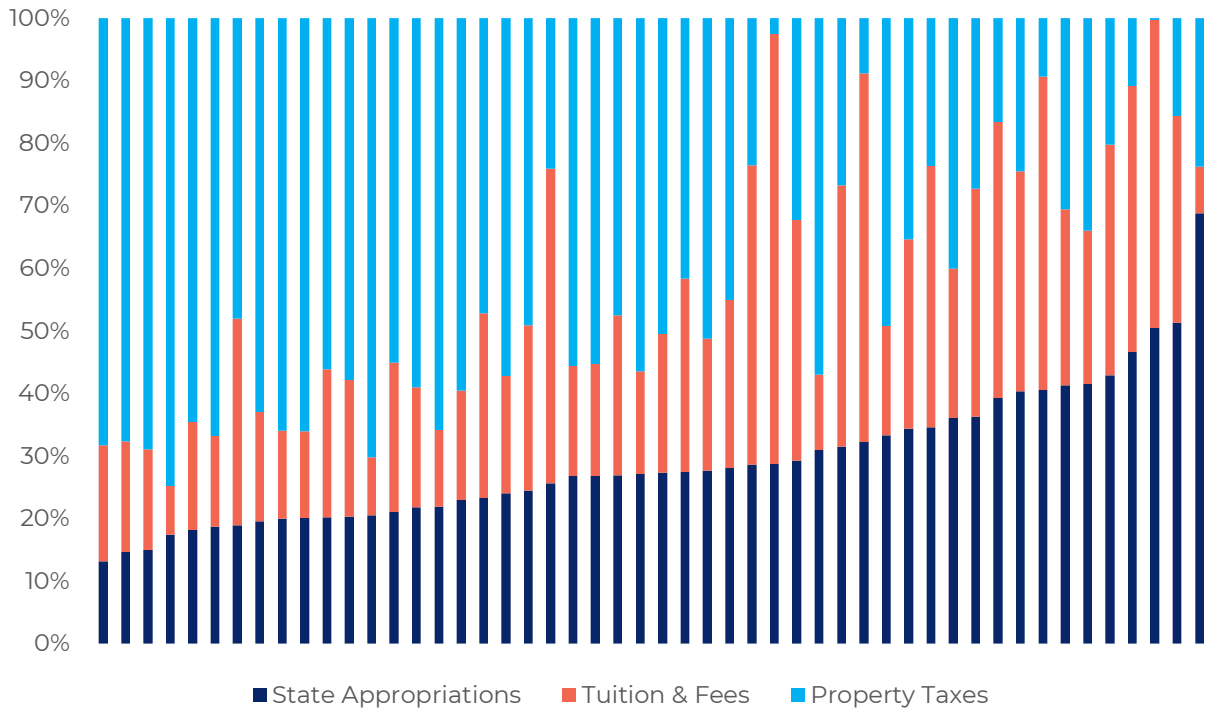
Community College Finance in Texas, Explained

Community college finance in Texas is made up of three core types of funds:

- **State funds** based on formulas for two-year institutions.
- **Local tax revenues** through local ad valorem (real estate/property) taxes levied by each respective board of trustees of the 50 Texas community college districts for the maintenance and operation of district facilities and repayment of bonds issued for capital projects.
- **Tuition and fees** from the payments students make to enroll at each district, which are determined individually by each local college district.

Notably, there is considerable variation from district to district in the proportion of funding from each of the three sources listed above. (See Figure 2 below for a snapshot of all 50 districts and further discussion in the Key Findings section.)

Figure 2. Funding Revenue Proportions by Texas District[11]



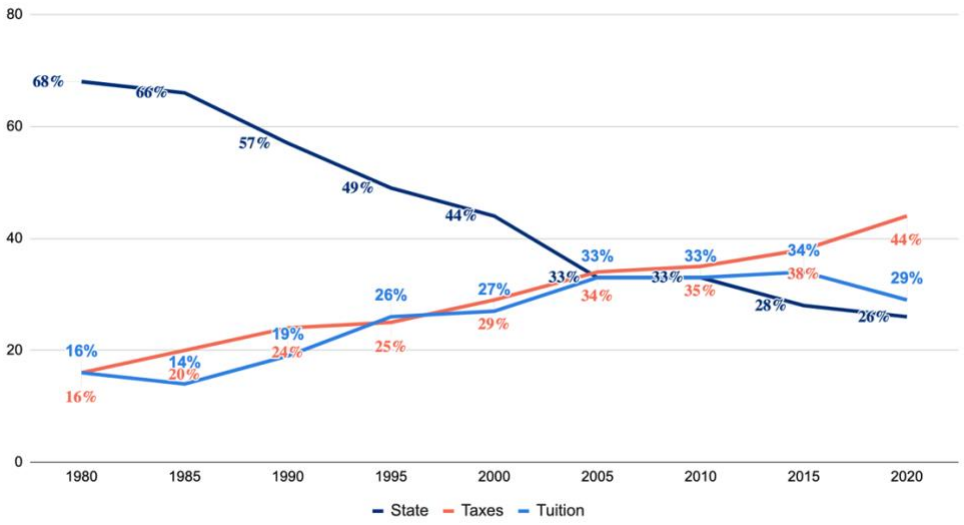
State Funding for Community Colleges

Each biennium, the state legislature appropriates funding to the 50 community college districts. For the 2022–23 biennium, the 87th legislature appropriated $1.8 billion to Texas community colleges. *However, over the past 40 years, the state's share of funding for community colleges has declined from 68% to 26%, with the balance paid for by higher tuition and fees and property taxes* (see Figure 3).

11 Data sources for figure:

- Fiscal Year 2022 State Appropriations – Basis of Legislative Appropriations 2022-2023 biennium
- Fiscal Year 2021 Tuition & Fees – CARAT Schedule of Operating Revenues
- Fiscal Year 2021 Property Taxes – Sources & Uses Detail

Figure 3: Texas Community College Revenue by Source (1980–2020)[12]



Throughout their work, the Commission acknowledged this funding shift and the need for additional state appropriations in order to boost both higher education and workforce outcomes for Texans. They write in their report, *"Strategic investments in community college outcomes, affordability, and capacity will secure our state's leadership in higher education and workforce development—and elevate Texas families and employers for decades to come."* Given that the Commission's recommendations for reforms must still be enacted by the state legislature, we present five key findings to continue and enhance the dialogue around making data-driven state finance and strategy decisions for community colleges.

In November 2022, the **Texas Commission on Community College Finance** released their final Report to the 88th Legislature with three main recommendations:

- **State Funding for Outcomes** – recognition of the vital role community colleges play in educating the workforce of the future as well as the associated costs and considerations they have to serve diverse and non-traditional students.
- **Affordability for Students** – attention to the financial needs community college students have when accessing higher education and job training.
- **Investments in College Capacity** – prioritization of a new model that gives community colleges reliable support and incentives to increase enrollment.

12 Data sources for figure:
- 1980-2005 data – Hudson, D. C. (2008, May). *A policy analysis of community college funding in Texas.* [Doctoral dissertation, The University of Texas at Austin.]
- 2010-2020 data –THECB CARAT – Operating Revenues

Key Findings: Opportunities for Data-Driven Finance Reforms

In light of the many goals community colleges are striving to achieve within the existing state finance structure—and drawn from our review of existing data and discussions with our advisory group, research partners, and other key stakeholders and experts— Texas 2036 has identified **five key findings**. They acknowledge current uncertainties, barriers, and challenges for community colleges as well as state-level opportunities that offer community colleges better support, predictability, transparency, and data for decision making. These opportunities can help leverage the potential of these colleges as critical and unique partners in achieving state higher education and workforce goals.

Our five key findings address the:

- Need for greater predictability in the state funding models.
- Role and impact of local economies of scale on community college finance.
- Value and rationale for incentivizing student outcomes to align with workforce and education goals.
- Need for colleges and the state to have access to better data to better serve students and ensure return on investment.
- Solution a powerful funding simulator offers for community college finance.

> ***Finding #1:***
> Community colleges need better predictability in their funding models to adequately plan and align with the state's higher education and workforce goals.

Three formulas currently determine the state's funding allocations to community colleges:

- **Core Operations** (currently 4% of state formula appropriations to community colleges) provides each community college district with a uniform amount of state funds determined by the state legislature every biennium.
- The **Contact Hour** formula (currently 79% of state formula appropriations) is based on the median costs in each of 26 different instruction and administration program areas and the number of contact hours taught by community colleges to students. The state legislature makes the final decision on how much funding to dedicate to the Contact Hour formula based on various factors, such as available funding and enrollment changes. The appropriation is then allocated to each district's proportionate share as determined by recommendations from the THECB.
- The **Student Success Point** formula (currently 17% of state formula appropriations) measures student completion of 11 success metrics (see callout box within the discussion of Finding #3). Community college districts are rewarded for moving students along various acceleration points. The state legislature makes the final decision on how much funding to dedicate to the Student Success Point formula by setting a funding rate per point earned. The appropriation for each district is then allocated based on a proportionate share of the total number of success points earned by all districts. [13]

13 Data sources for figure:
Legislative Budget Board. (2019, March). *Financing public higher education in Texas: Legislative primer*, p. 25. https://www.lbb.texas.gov/Documents/Publications/Primer/4909_Financing_Public_Higher_Ed.pdf

While the Contact Hour and Student Success Point formulas together total 96% of state community college funding, community colleges have limited ability to predict exactly what their state appropriation will be. There are notable uncertainties because a final appropriation decision must be made before the formulas are used to proportionately allocate funds to colleges, and it is possible for some colleges to lose funding despite increasing their contact hours and/or success points based on the final appropriation amount for all community colleges. (See Figure 4 for a simplified example).

Figure 4. State Funding Variation in the Current Finance Model, An Example

$1,000
Available Funding

	2022	2022 Funding	2023	2023 Funding
College X	100 students	**$500** ($5 per student)	135 students	**$540** ($4 per student)
College Y	100 students	**$500** ($5 per student)	115 students	**$460** ($4 per student)

By shifting to a dynamic finance system based on data measuring students' outcomes, as the Commission recommends, the state can commit strategic investments towards desired state outcomes for community colleges. In turn, this allows community colleges to plan biennial spending strategies around meeting the state's priority outcomes.

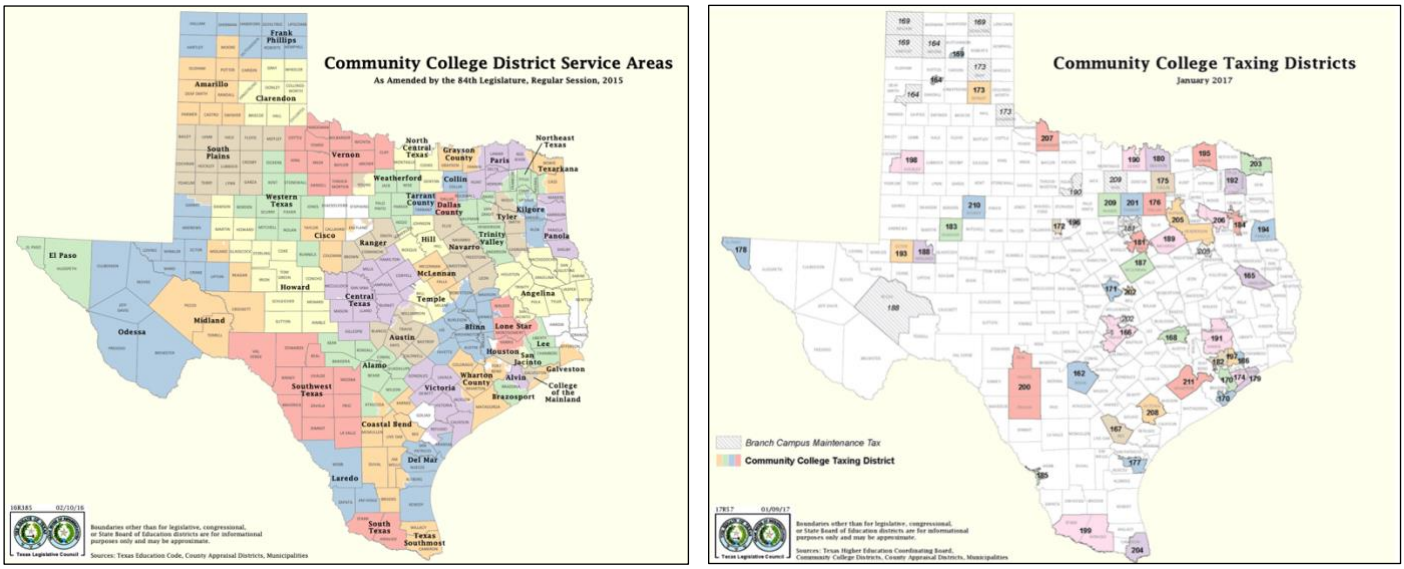
Finding #2:
Acknowledging economies of scale between community college districts can help ensure students statewide have equitable access to postsecondary opportunities.

As noted earlier, community colleges primarily rely on a "three-legged stool" of revenue sources: state appropriations, property tax revenues, and tuition and fees. Colleges vary widely in the proportion of funding from each of those sources they've each chosen to meet their needs. Some rely more on local dollars raised through property taxes and/or tuition and fees, others are reliant on state appropriations, and some have a fairly balanced portfolio between the three revenue sources (refer back to Figure 2).

Accessibility of local dollars is the main reason for the differences in resourcing across community colleges. Each college district has a board of locally elected trustees who drive institutional funding decisions. Based on factors like the size and valuation of their taxing district, the needs of their service area, and the number of students they serve, community college trustees make decisions on how much of each revenue source they should rely on. These decisions impact the tuition and fees charged to students as well as the tax rates charged (or brought to a local election) to local taxpayers.

Districts vary significantly in their service areas, taxing districts, and the size of the student population they serve. Enrollment per college district ranged from 1,417 students to 61,811 in Fall 2020. [14] Similarly, the values of taxable properties within community college districts also vary widely. They ranged from $173.4 million to $271.2 billion total per district in fiscal year 2021 [15] with notable differences between a district's geographic service area (the area whose residents can enroll in a specific community college) and their taxing districts (the areas whose properties can be taxed). (See Figure 5.)

Figure 4. Community College Service Area vs. Taxing District Size



As a result, total maintenance and operating revenues from the three-legged stool per district also vary greatly, ranging from $6.2 million to $455.8 million. [16]

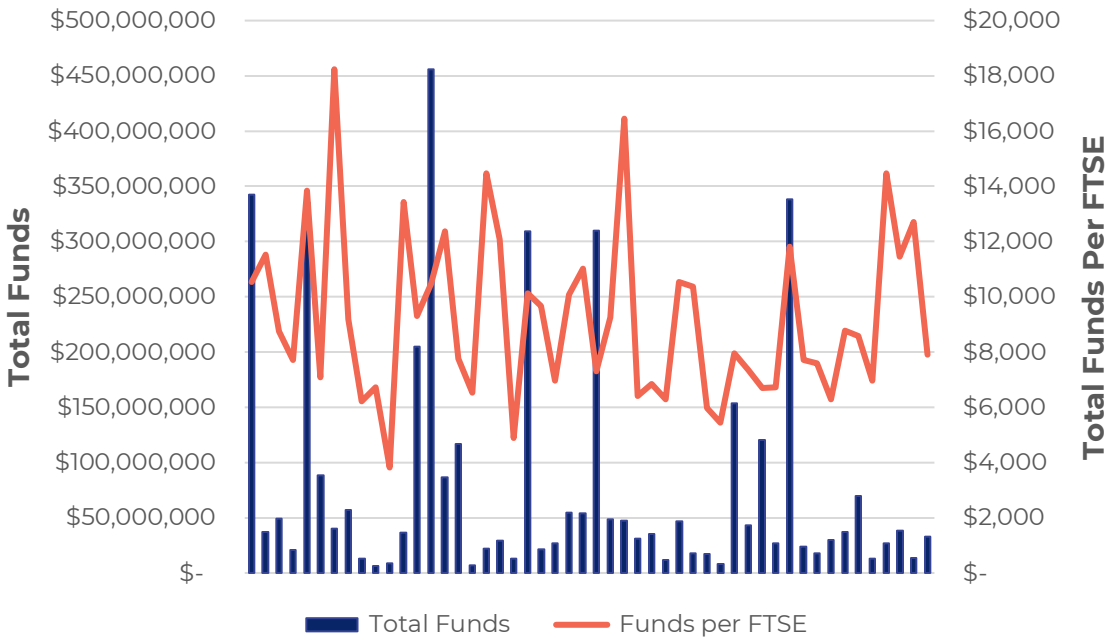
These variations are contextualized best from a per student funding perspective, denoting each district's available financial resources to support their students and ensure they succeed in their community college education and/or training program. Based on full-time student equivalents (FTSE) in fiscal year 2021, the spread in funding is $3,818 to $18,238 per FTSE (see Figure 6). Notably, the two districts with the highest and lowest numbers of funding per FTSE each serve about the same number of students (about 2,300 students).

14 Texas Higher Education Coordinating Board. (2021). *2021 public higher education almanac: A profile of state and institutional performance and characteristics.* Fall 2020 enrollment. https://reportcenter.highered.texas.gov/agency-publication/almanac/2021-texas-public-higher-education-almanac/

15 THECB Community College Annual Reporting & Analysis Tool. (n.d.). FY 2021 net assessed valuation figures. http://reports.thecb.state.tx.us/approot/carat/tax_info.htm

16 Texas 2036. (2022). *Community college finance simulator: Data sources*. https://texas2036.org/community-college-finance/simulator-tool-data-sources

Figure 6. Texas Community College Funding – Total and Per Student (FTSE) [17]



These economies of scale among community college districts translate to material impacts for students, including varying availability of courses and student support resources (i.e., counseling, technology, or textbook materials, etc.). Ensuring that all Texas students have equitable access to high-quality postsecondary opportunities at community colleges requires attention to available resources and the funding that supports them.

Finding #3:
The current funding model is not set up to adequately incentivize those outcomes that meet state higher education goals and workforce needs.

The 63rd Texas State Legislature first established a formula-based finance system, using the Contact Hour formula, to fund Texas community colleges in 1973. [18] Since then, no major changes were made to the state community college finance system until 2013 when the Student Success Points (SSP) formula was added. [19] The SSP formula was established to leverage state funds to drive improvements in student outcomes across 11 success metrics (see callout box).

17 Data sources for figure:
- Fiscal Year 2022 State Appropriations - Basis of Legislative Appropriations 2022-2023 biennium
- Fiscal Year 2021 Tuition & Fees – CARAT Schedule of Operating Revenues
- Fiscal Year 2021 Property Taxes – Sources & Uses Detail
- Fiscal Year 2021 FTSE - CARAT

18 Hudson, D. C. (2008). *A policy analysis of community college funding in Texas,* p. 30. [Doctoral dissertation, The University of Texas at Austin]. Texas Scholar Works. https://repositories.lib.utexas.edu/handle/2152/29607

19 Texas Association of Community Colleges. (2018). *Performance based funding for Texas community colleges*. https://tacc.org/sites/default/files/documents/2018-08/performance_based_funding_for_community_colleges.pdf

STUDENT SUCCESS POINTS METHODOLOGY, IN BRIEF

Measure 1: College Readiness

- *Math: Determine student's college readiness in math as a first time undergraduate (FTUG). (1.0 points)*
- *Reading: Determine student's readiness in reading as a FTUG. (0.5 points)*
- *Writing: Determine student's readiness in writing as FTUG. (0.5 points)*
- *For all three of the above, those not ready at enrollment who became ready within the academic year qualify.*

Measure 2: Successfully Complete First College-Level Math Course

- *Student passes first college-level math course with a grade of "A", "B" or "C" in fiscal year measured. (1.0 points)*

Measure 3: Successfully Complete First College-Level Reading/Writing Course

- *Student passes first college-level reading/writing course in fiscal year measured. (0.5 points for reading, 0.5 points for writing if separate courses).*

Measure 4: Successfully Complete 15 Semester Credit Hours (SCH)

- *Accumulate student's successfully completed (as defined by state codes starting in 2011) SCH from 3 previous years, plus the year being measured. (1.0 points if no point awarded in previous 2 fiscal years)*

Measure 5: Successfully Complete 30 SCH

- *Same methodology as Measure 4, but for 30 SCH (1.5 points)*

Measure 6: Degrees, Core Curriculum Completers, and Certificates Awarded

- *A student who completes a degree or certificate, or is a core curriculum completer (CCC). Unduplicated degrees and certificates awarded by the district in the fiscal year being measured are counted (one degree or award per student), excluding Critical Fields. (1.2 points)*

Measure 7: Graduates in Critical Fields and Transfers

- *Critical Fields: A student who completes a degree or certificate in a Science, Technology, Engineering, or Math (STEM) or allied health major (specific major codes are specified). Unduplicated degrees and certificates awarded in the fiscal year being measured are counted. (3.25 points)*
- *Transfers: A student found enrolled for first time at public/private university in year measured who has a record of successfully completing at least 15 SCH at the same two-year institution/district prior to university enrollment (during 3 years prior), including certain co-enrolled students. (3.0 points)*

(Source: Adapted from THECB's Success Points Data Flow)

However, the SSP formula has faced barriers since its implementation, preventing community colleges in aggregate from organizing fully around the desired outcomes laid out in the formula. Foremost, relatively little state funding is dedicated to the formula—only around 3% of total annual community college maintenance and operation funds. Second, as discussed in Finding #1, it is difficult for colleges to predict potential state SSP appropriations in the current system. Thus, even when community colleges align operations with strategies that maximize their points earned through the SSP formula, it does not yield high returns.

The number of different success metrics through which points can be earned also makes it difficult for community colleges to home in on the target outcome metrics of graduation and transfer that are key to meeting state higher education goals. Table 1 shows the total number of students between fiscal years 2014 and 2020 whose achievements have counted under the different categories of success metrics. The lion's share of points is earned by students who complete the First College-Level Course and College Credit Attainment metrics. Thus, even if students do not ultimately graduate or transfer, institutions can still earn ample success points and the associated state funding.

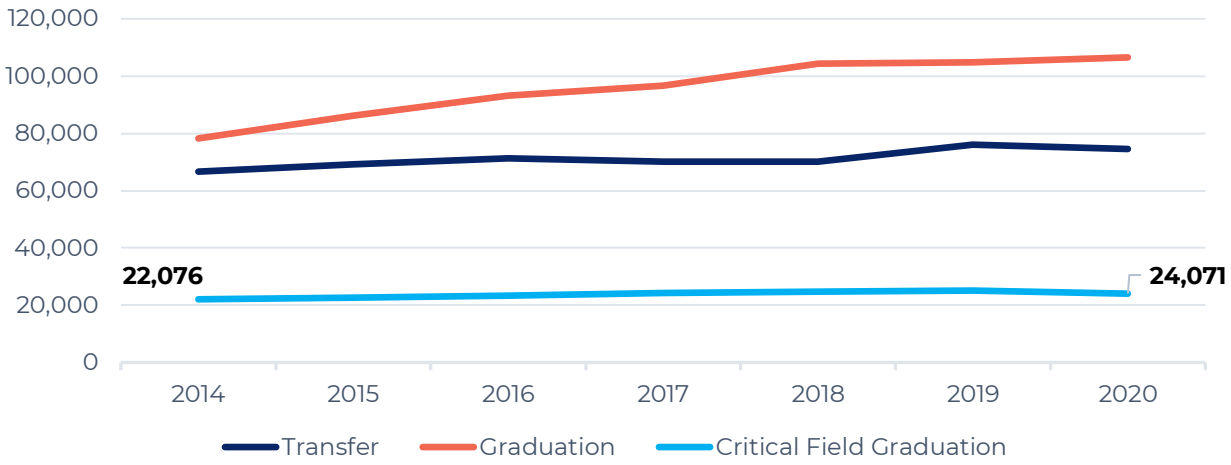
Table 1. Success Points Earned by Students[20]

Categories of Success Point Metrics	Total Unweighted Points Earned (FY 2014–2020)
College Readiness/Developmental Education Metrics	646,063
First College-Level Course Metrics	3,594,353
College Credit Attainment Metrics	2,418,988
Target Outcomes Metrics (Graduation or Transfer)	1,334,263

This dynamic has affected the state's growth in the Target Outcomes metrics over the past decade. Figure 7 shows the number of students earning success points through each of the Target Outcomes metrics of Graduation, Critical Field Graduation, and Transfer. The number of community college students successfully transferring to a four-year university has only grown by an additional 7,950 students per year since fiscal year (FY) 2014. The rate of students graduating with a degree or certificate in a critical field—programs aligned with the state's workforce needs—has been largely flat, even decreasing by 4% between FY 2019 and 2020. Finally, although there was growth in the Graduation outcome metric between FY 2014 and 2020, that growth comes with the caveat that core curriculum completers—students who complete the classes required by the core curriculum but do not earn a degree, certificate, or other credential—are counted in the metric. For context, there were an average of 21,565 core curriculum completers annually between 2018 and 2020 or approximately 20% of the students that could be counted in the Graduation metric.

20 Texas Higher Education Coordinating Board. (n.d.). *Basis of legislative appropriations*. https://www.highered.texas.gov/institutional-resources-programs/funding-facilities/formula-funding/basis-of-legislative-appropriations/

Figure 7. Count of Students Earning Ultimate Success Points[21]



Although many of the SSP formula's metrics show that students are progressing through their community college education, the state's key higher education goal, both through 60x30TX and BTST, has been the attainment of a postsecondary degree or certificate. As Texas moves to improve return on investment for postsecondary students through credentials of value, orienting the community college finance system around completion of a degree or certificate can help Texas achieve its key goal.

Finding #4:
Community colleges can better serve student needs with improved data confirming the value of credential offerings.

We identified **three data opportunities** that will help community colleges and the state better plan for student needs and strategize to achieve higher education and workforce goals. These opportunities involve data on potential wages, linked occupations, and expanded credentials.

To review what data are currently available to community colleges as well as to identify potential data solutions, the Texas 2036 team partnered with researchers at the Texas Schools Project at The University of Texas at Dallas to access the state's education and workforce data through the Texas Education Research Centers (ERCs).

Data Opportunity #1: Potential Wages

As part of its emphasis on credentials of value, the BTST higher education strategic plan seeks to raise incomes for individual Texans while reducing debt. This can be accomplished by determining the potential wage premiums tied to each credential offered by a Texas higher education institution. As the state works to identify the value of each credential available in Texas, ensuring that community colleges also have access to this potential wage data allows them to assess whether the programs offered to students are providing material returns.

21 Data source for figure: Basis of Legislative Appropriations: https://reportcenter.highered.texas.gov/reports/data/

Data Opportunity #2: Linked Occupations

Improved occupational data can create linkages between higher education offerings and occupational demand. For example, richer occupational data can help determine whether a digital information technology certificate program actually leads to an IT job. In turn, credential programs with validated labor market linkages have a key workforce value proposition colleges and others can communicate to potential students and employers. Such occupational data, however, is currently unavailable in state databases. The ERCs currently only house industry-level classifications. [22] Relying only on industry data can lead to faulty linkages between jobs and higher education offerings. This is because, for instance, it is possible for grocery store stockers and pharmacy technicians in a grocery store pharmacy to be categorized under the retail industry, even though the latter occupation is better classified in the healthcare industry. Given the many community college offerings that lead to job-specific credentials, like trades licenses and occupational skills awards, it is important that students know specific linked occupations.

Data Opportunity #3: Expanded Credentials Data

The BTST plan's pivot to recognize all types of credentials of value also requires the state to have accurate and complete data on all credentials that are offered by Texas higher education institutions. Currently, data on credentials offered by community colleges are incomplete. Texas community colleges are required to regularly report data on the following credential types: associate degrees, bachelor's degrees, Advanced Technology certificates, Level 1 and 2 certificates, and Enhanced Skills certificates. [23] This list does not capture all available credentials offered in the country, state, or by individual community colleges. An analysis of the credential landscape identified as many as 967,734 unique credentials in the U.S., which includes an evolving array of degrees, workforce-aligned certifications, licenses, badges, and apprenticeships, to name a few. [24] In order to determine the value of the many credentials offered to Texans, the state must work with community colleges to determine and implement data collection and reporting best practices to expand information in state credentials databases.

Taken together, these are three important and necessary opportunities to strengthen and enhance the availability and use of data directly relevant to decisions about community college finance, policy, and strategy.

Finding #5:
A customizable community college finance simulator can strengthen and streamline the process for considering state finance system reforms.

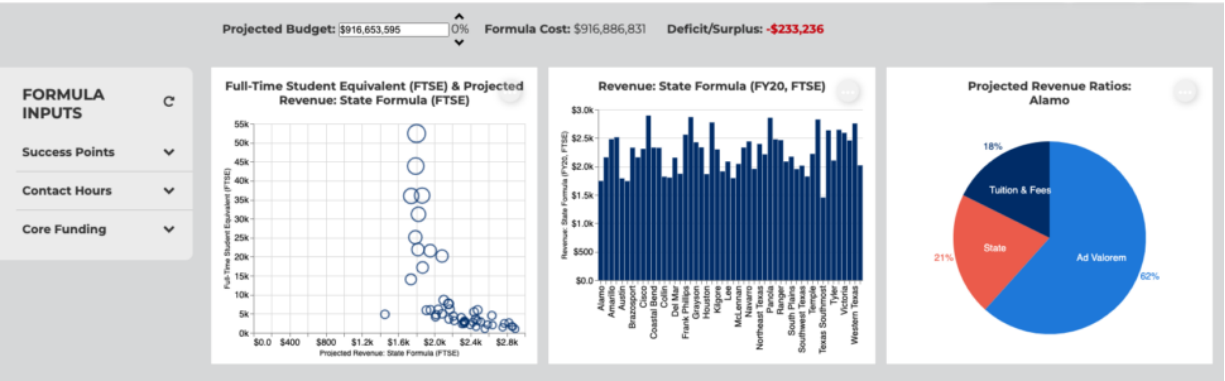
22 The University of Texas at Austin (2017). *TWC data – ERC data inventory*. Retrieved November 2, 2022, from https://research.utexas.edu/wp-content/uploads/sites/12/2017/06/TWC_Data_062217.pdf

23 Credential Engine. (2021, February). *Counting U.S. postsecondary and secondary credentials.* https://credentialengine.org/wp-content/uploads/2021/02/Counting-Credentials-2021.pdf

24 Credential Engine. (2021, February). *Counting U.S. postsecondary and secondary credentials.*, p. 8 https://credentialengine.org/wp-content/uploads/2021/02/Counting-Credentials-2021.pdf

Given the complexities and opportunities surrounding community college financing as outlined in our first four findings and the Commission's final report, there was clear value in and need for a tool with the capacity to make rapid financial projections of proposed state funding changes that reflect a nuanced understanding of community college finance possibilities. Such a tool—and the informed policy decisions it may lead to—can directly address our first four key findings. By providing "bottom-line" cost comparisons for the state and each community college district the Texas 2036 Community College Finance Simulator (CCFS) thus far has empowered policy makers, community college leaders, and advocates to understand, with a reasonable degree of confidence, the fiscal implications of any particular set of policy decisions being considered.

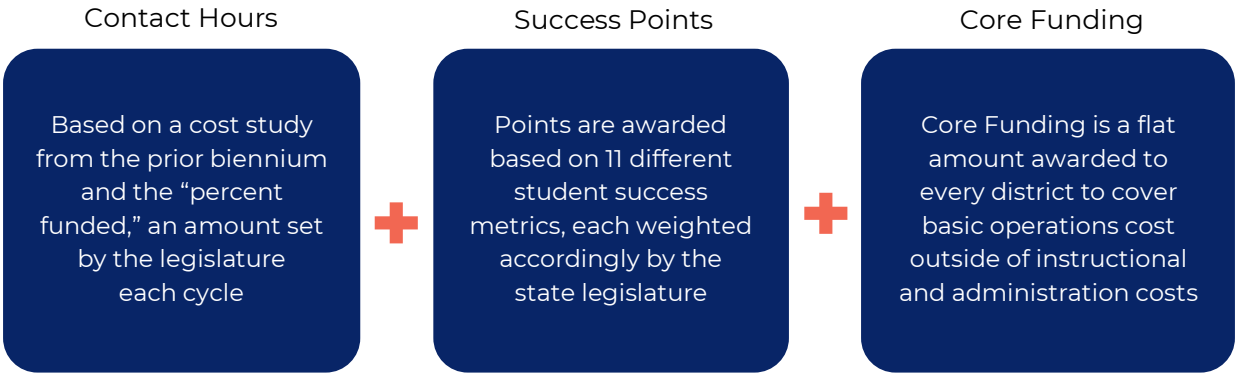
Our goal was to provide the Commission and other key stakeholders *with a robust and user-friendly tool—ultimately allowing them to compare the fiscal impacts of policy changes quickly,* then immediately make further edits to refine policy recommendations. By creating the CCFS tool with graphics outlining fiscal impacts, we made calculations and trade-offs from policy changes clearly visible. Additionally, speed is a powerful catalyst when considering transformational reforms impacting many stakeholders. By customizing the various complexities and funding change options within the CCFS, we shortened the cost-comparison process to a matter of seconds per option.



A community college finance simulator tool must stay responsive to user needs. We developed multiple iterations of the CCFS to allow the Commission and other stakeholders to both learn about what issues might exist within the current finance system as well as consider various policy changes. In turn, we continued to refine the tool to best meet evolving policy needs.

For comparison purposes, the CCFS includes a model outlining the state's current finance system (see Figure 8). Based on final state appropriations levels for fiscal year 2022, users can explore how modifications to any of the three existing state formulas will change how funding is allocated to each college district. This was key to illuminating Finding #1 on how allocation formulas reduced funding predictability for community colleges.

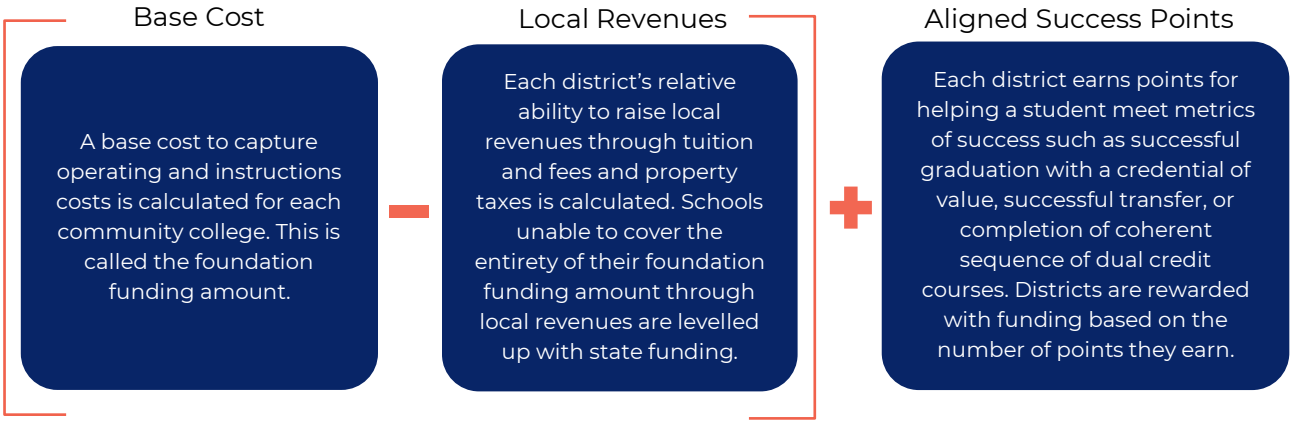
Figure 8. Texas' Current Finance System, as Modeled in the Simulator



We then worked with the Commission, community college leaders, and other experts and stakeholders to identify potential policy changes to the current finance system. This resulted in additional models that included features such as funding formula structures (rather than allocation formulas), funding weights for financially or academically disadvantaged students, and mechanisms that incorporate each district's ability to raise local revenues through tuition and property taxes.

Now that the Commission has finalized their recommendations, we have streamlined the CCFS to model the state finance system as proposed by the Commission (see Figure 9). This final model incorporates features that we built into previous iterations of the tool with refinements outlined by the Commission. Given that the next step is for the Commission's recommendations to be considered by the 88th State Legislature in 2023 through legislation, the CCFS now has functionalities in its updated model that allow users to exploring key variables that will need to be decided by legislative officials.

Figure 9. Finance Reform Recommendations by the Texas Commission on Community College Finance (2022)



Our intent with the final version of the CCFS remains the same: to provide legislators and other key stakeholders with a tool that outlines the state and local fiscal implications of policy changes to the Texas community college finance system. As such, the CCFS will remain online and available to the public, ensuring that the state legislature and stakeholders can iterate on policy changes using accurate and strong data.

Anchoring the Conversation with Data, Driving Workforce Development

The crucially important role of Texas community colleges is clear. To actualize their potential in higher education and workforce development, it will be key for the state and these public institutions to be able to organize their programming and strategies around state goals and benchmark their diverse student outcomes and progress with quality, accessible data. The current focus on community college state finance reform has presented a distinct opportunity to better understand, align, and incentivize these colleges to do what they do best: provide higher education, skill building, and training to all Texans in their own communities that lead to career success.

Our Community College Finance Simulator—and the key findings and insights that drove its development—is an example of a model process possible in any region or state considering policy reforms. It offered a clear and collaborative understanding of the parameters for the policy reform, available data, and endpoint goals.

Appendices

Appendix A:
Background on the Texas Commission on Community College Finance

The Texas Commission on Community College Finance was created by Senate Bill 1230 (87-R), authored by Sen. Larry Taylor and sponsored by Rep. Leo Pacheco.

SB 1230 states:
"The Texas Commission on Community College Finance is established to make recommendations for consideration by the 88th Texas Legislature regarding the state funding formula and funding levels for public junior colleges in Texas that would be sufficient to sustain viable junior college education and training offerings throughout the state and improve student outcomes in alignment with state postsecondary goals."
(Sec. 130.1305 (a), Texas Education Code)

Commission members were appointed accordingly.

- Four members appointed by the governor:
  - Woody Hunt (Commission Chairman) – Senior Chairman of the Board of Hunt Companies, Inc.
  - Mark Escamilla, Ph.D. – President and CEO of Del Mar College
  - Brian Jones – Director of Professional Learning at Odessa College
  - Todd Williams – Chairman and CEO of The Commit Partnership and founder and president of the Todd A. Williams Family Foundation
- Three members appointed by the lieutenant governor:
  - Sen. Brandon Creighton
  - Sen. Larry Taylor
  - Stephen Head, Ph.D. – Chancellor and CEO of the Lone Star College System
- Three members appointed by the speaker of the house of representatives:
  - Rep. Gary VanDeaver
  - Rep. Oscar Longoria
  - Brenda Kays, Ph.D. – President of Kilgore College
- One member appointed by the Texas Association of Community Colleges:
  - Brenda Hellyer, Ph.D. – Chancellor of San Jacinto College
- One member appointed by the Community College Association of Texas Trustees:
  - Carol Scott – Chair of the Del Mar College Board of Regents

Appendix B:
Further Reading on Texas Community College Finance

- Community College Finance Simulator by Texas 2036 along with a user guide, data sources, and related contextual information.

- Building a Talent Strong Texas, the current strategic plan for Texas higher education by the Texas Higher Education Coordinating Board for 2022–2030.

- Texas Commission on Community College Finance key documents:
  - Final Report (November 2022)
  - Meetings and Materials Archive

- Property Taxes at Texas Community Colleges from Texas Association of Community Colleges, which gives more information on how community colleges must levy property taxes, what these taxes can fund, and how this tax revenue contributes to their overall finance structure currently and historically.

For Additional Information, Please Contact:

info@texas2036.org

(469) 384-2036

210 W. 7th Street, Suite 1100, Austin, Texas 78701

TEXAS 2036