

Implementing Postsecondary Competency-Based Education

Lessons Learned From Five Institutions' Implementation Journeys

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Executive Summary

Postsecondary competency-based education (CBE) has grown nationally and continues to gain attention as postsecondary institutions seek more learner-centered, flexible, and equitable pathways to better serve today's students, especially working adults and other learners for whom traditional models of postsecondary education may be less accessible. CBE programs vary widely in terms of design and operations and require institutions to make substantial changes to the way they operate, so implementation research is an important foundation for understanding how these programs serve students. Existing case studies of single-program implementation provide important insights into how CBE programs are implemented, but questions remain about similarities or differences in how CBE programs are implemented across institutions, as well as how institutions navigate those implementation journeys.

With funding from Ascendium Education Group, the American Institutes for Research (AIR) is partnering with the postsecondary CBE community nationally to share best practices and lessons learned about implementing these programs. To achieve this goal, AIR is collecting enrollment and outcome data and conducting a rigorous quasi-experimental study to assess CBE's impact on student success.

For more information about the study and AIR's research on postsecondary CBE, please visit our website at www.air.org/postsec-cbe.

In this study, the American Institutes for Research (AIR), with support from Ascendium Education Group, aims to address these questions by examining the CBE implementation experiences of five postsecondary institutions. AIR researchers were guided by the following research questions:

1. What program model features have participating programs implemented?
2. What barriers and facilitators do programs face in implementing their programs?
3. How do these program model features, barriers, and facilitators affect programs' implementation experiences?

Drawing on semi structured interviews with senior institutional leaders, CBE program leaders, and CBE program staff, this report identifies themes across four phases common to their implementation journeys: Motivate, Plan, Launch & Iterate, and Scale & Sustain. Overall, we found that, although institutions made different design choices and navigated unique challenges, key commonalities existed in how they approached implementation and managed the substantial change it required.

Key findings include:

- **Program Design Features:** CBE programs were designed to meet the needs of working adult learners through prioritizing flexible design features that would enable learners to make college “fit” with their lives. This commitment to serving learner needs was reflected in the design decisions that program leaders made about flexibility, competency and learning, and supports for learners.
- **Motivate:** Leaders at institutions were motivated to pursue CBE in response to factors like enrollment declines, workforce and community needs, and state policy contexts, viewing CBE as a strategy to increase access, affordability, and relevance for adult learners.
- **Plan:** Effective planning for CBE required strong senior leadership support to provide momentum and navigate challenges, intentional strategies to build faculty and staff buy in, and engagement with cross-functional teams who were critical to implementing CBE successfully, given the many ways that CBE implementation affects academic, administrative, and learner support systems and processes across institutions.
- **Launch and Iterate:** Programs typically launched with small pilots to test design choices, surface system and process challenges, and refine the ways programs supported students, using early data and feedback to guide incremental iterative improvements. Program leaders often developed initial manual workarounds before moving toward more scalable solutions.
- **Scale and Sustain:** As programs grew, institutional and program leaders described expanding CBE offerings, embedding CBE into organizational structures, and streamlining systems. Strong senior leadership support reinforced CBE as a strategic priority and facilitated the process of dedicating the resources and process redesigns needed to scale and sustain these programs.

These insights offer a deeper understanding of how institutions bring CBE to life and highlight opportunities to strengthen implementation as the field continues to evolve. Looking ahead, our work with these longstanding institutional partners will continue as part of AIR’s broader, multiyear evaluation of learner outcomes in postsecondary CBE programs. Building on the implementation insights documented in this report, subsequent phases of the study will integrate program level design information with enrollment and outcome data. Through this work, we aim to provide a deeper understanding of CBE’s impact on learner success and how learner outcomes may be shaped by programs’ design choices and implementation experiences.

Introduction

Postsecondary competency-based education (CBE) programs have grown nationally, gaining substantial attention from postsecondary institutions that are interested in providing more learner-centered, flexible, and equitable pathways for today's college students. Many institutions have been engaged in innovation to develop programs that address key barriers in postsecondary education, especially for working adults and other learners for whom traditional models of postsecondary education may be less accessible.

Research points to promising outcomes for learners in CBE programs (Navarre Cleary, 2020; Rivers & Sebesta, 2017), but the field still lacks robust evidence about learner outcomes. Because CBE programs vary widely in terms of design and operations (Parsons et al., 2023), implementation research is an important foundation for understanding and interpreting student outcomes. It also is important because, unlike discrete interventions or instructional modalities, CBE requires institutions to make substantial changes to the way they operate, including integrating CBE into existing institutional systems and processes, working with faculty and staff to gain support for CBE, adjusting teaching and learning to align with CBE principles, or navigating external policies like accreditation and federal financial aid policies.

Although case studies of single-program implementation provide important insights into how CBE programs are implemented at individual institutions (see, for example: Cooper, 2016; Rivers et al., 2019), cross-institution analyses of CBE program implementation remain limited. In particular, there is a dearth of research on how institutions navigate the implementation journey across different institutional and external contexts; how institutional mission, strategy, and constraints shape program design decisions; and how specific design features may influence learner outcomes. In this report, we aim to address these gaps through a cross-institution study of CBE program implementation. The study was guided by three key research questions:

1. What program model features have participating programs implemented?
2. What barriers and facilitators do programs face in implementing their programs?
3. How do these program model features, barriers, and facilitators affect programs' implementation experiences?

With funding from Ascendium Education Group, the American Institutes for Research (AIR) is partnering with the postsecondary CBE community nationally to share best practices and lessons learned about implementing these programs. To achieve this goal, AIR is collecting enrollment and outcome data and conducting a rigorous quasi-experimental study to assess CBE's impact on student success.

For more information about the study and AIR's research on postsecondary CBE, please visit our website at www.air.org/postsec-cbe.

Overall, we found that, although institutions made a range of design choices and navigated unique challenges, key commonalities existed in how they approached implementation and managed the substantial change it required. Examples include grounding design decisions in learner flexibility; relying on strong leadership and cross department collaboration to navigate challenges with systems and processes and build buy-in; intentionally supporting faculty through role changes and workload shifts; and using data and feedback loops to refine programs over time.

We describe in the sections that follow our approach to the study, including the conceptual framework that guided our research and the institutions that participated. Next, we explore how institutions navigated key stages of the implementation journey, from the catalysts and motivations that got them started, through planning, implementation, and iteration, to how they are sustaining and scaling programs going forward. We conclude with considerations for institutions interested in exploring CBE implementation.

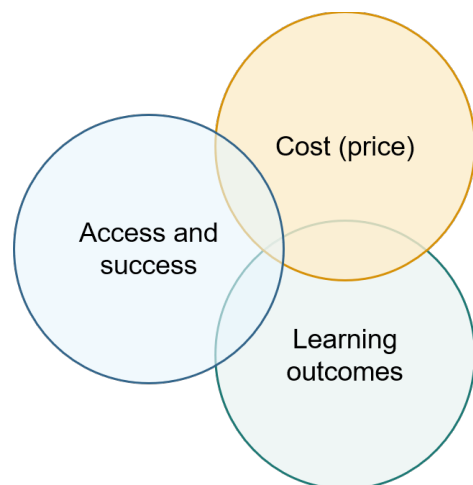
WHAT IS CBE?

Postsecondary CBE is an approach that centers learning and program completion on clearly defined competencies and requires learners to demonstrate what they know and can do, rather than progress based on grades or credit hours. In CBE programs, an intentional and transparent curriculum approach identifies competencies that learners must master and clearly ties those to program progression and completion. Learning expectations remain constant, and learners have flexibility in how long they take to demonstrate mastery and progress. Typically, learners demonstrate mastery via authentic, performance-based assessments to earn program credentials. Although definitions of CBE vary across institutions, most programs share three common elements: (a) curricula designed with specific competencies, (b) advancement through the program based on demonstration of competency, and (c) flexibility in the time learners take to demonstrate a competency (Mason et al., 2020).

Three commonly cited value propositions for CBE exist in the field and describe how CBE is intended to benefit learners.

These value propositions reflect why learners may choose CBE and why they may experience improved outcomes in CBE programs, including expanding access and promoting success, reducing price/cost to learners, and ensuring quality in learning outcomes. These value propositions (see Exhibit 1) are interrelated and can reinforce one another. For example, making programs more affordable also may help broaden access and improve learning outcomes (Parsons et al., 2023).

EXHIBIT 1. CBE VALUE PROPOSITION TO LEARNERS



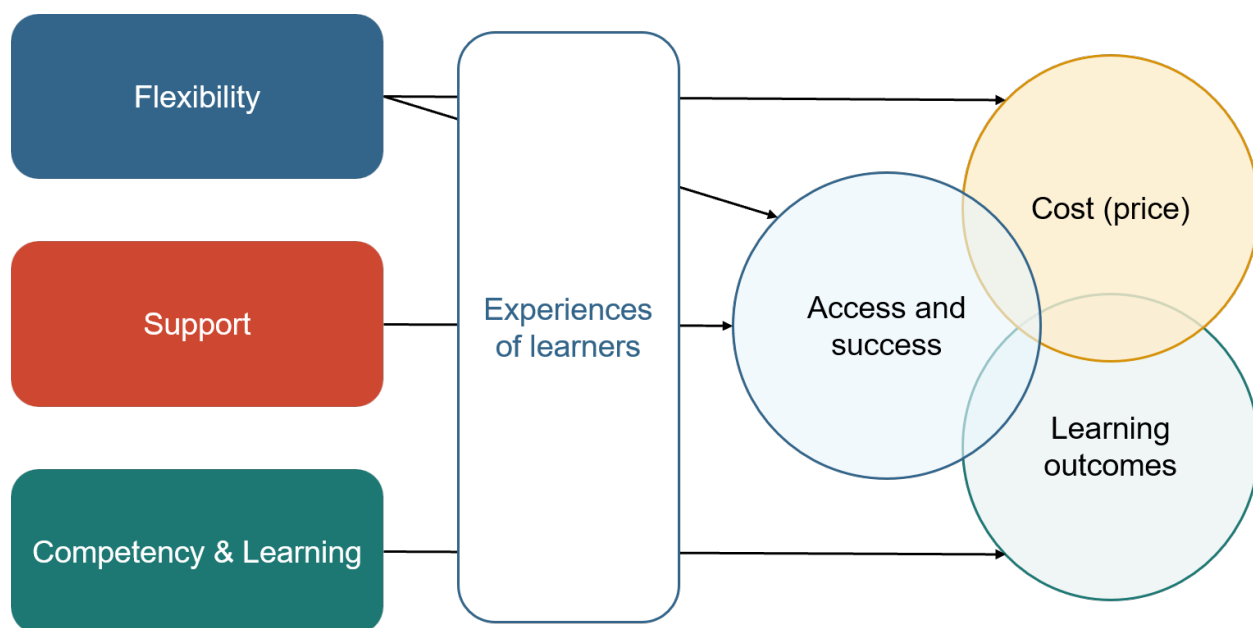
CONCEPTUAL FRAMEWORK

Because design choices in CBE programs are connected closely to and often influenced by program implementation experiences, this report examines what design choices program leaders made, as well as how those decisions unfolded in practice. To understand both the *what* and the *how* behind the implementation journeys at the institutions in our study, we drew on AIR's Postsecondary CBE Program Model Map Framework (Parsons et al., 2023), which is a descriptive tool designed to help both CBE practitioners and researchers understand how CBE programs are structured and how they can vary across a range of design principles. The CBE Program Model Map lays out 10 design domains: Institutional Context, Administrative Elements, Competencies, Program & Curriculum Design, Assessment Strategies, Learner Experience, Program Pathways & Support, External Partners, Transparency of Learning, and Continuous Improvement. Taken together, these domains and the design decisions that program leaders make within each provide a view of how CBE programs can take shape in practice. Importantly, the CBE Program Model Map offers a structured approach to documenting and communicating the design decisions program leaders make; it is not intended to define quality in CBE programs.

Across the 10 domains and potential design decisions within each, the CBE Program Model Map identifies 3 overarching design principles that shape how learners experience CBE, including allowing **learner flexibility**, providing **support** for learners, and designing curriculum and assessments around **competency and learning**. Each of these design principles affects learners' experiences, which in turn shape the potential value propositions to learners. These design principles also can inform the decisions that program leaders make. For example, a program that is prioritizing flexibility may make decisions like offering learners options to either accelerate through a program or slow their pace or pause their program

as needed. As Exhibit 2 shows, these principles interact rather than map one to one with outcomes; each shapes learners' experiences and contributes to multiple value propositions.

EXHIBIT 2. RELATIONSHIPS BETWEEN CBE PROGRAM DESIGN PRINCIPLES AND CBE VALUE PROPOSITIONS



Although the CBE Program Model Map helps identify the design decisions that CBE program leaders make, it does not delve deeply into how and why they make those decisions. Thus, we paired the program model map with a journey mapping approach that helps explain the sequencing, contexts, constraints, and motivations that shaped program leaders' decisions. We frame the implementation journeys that program leaders described within four phases:

- **Motivate:** How did institutions understand learner needs or pain points? What problems or challenges were they trying to solve?
- **Plan:** How did institutions organize people, processes, and resources to design and plan for CBE program implementation?
- **Launch and Iterate:** How did institutions roll out their CBE programs and refine them in response to early feedback and challenges?
- **Scale and Sustain:** How did institutions scale their CBE programs and embed them in institutional structures and policies?

These implementation phases structure the remainder of this report. In the next section, we describe our study approach and participating institutions before describing how implementation journeys unfolded across these four phases.

STUDY APPROACH

To understand the experiences that program leaders had implementing CBE programs, including variation in approaches to design and operation and key barriers and facilitators that influenced implementation, we used a qualitative research design with two key phases. Five institutions participated in the study, including two 2-year institutions and three 4-year institutions. Each of these institutions has multiple CBE programs as well as traditional, non-CBE programs; none offer only CBE. Several factors guided institution selection for this study: (1) institutions have both CBE and traditional programs; (2) institutions have been implementing CBE programs long enough to have experience with the full implementation journey (i.e., from planning and design to scaling and sustaining programs); and (3) institutions represented a range of institution types, sizes, and geographic locations.

First, because of the wide variety in design choices and operational approaches inherent in CBE programs, we began by drawing on the CBE Program Model Map to establish a common foundation for understanding and comparing experiences across programs. Program leaders at each partner institution first completed the CBE Program Model Map, documenting key features of their programs, including administrative structures, competency design, assessment strategies, learner supports, and continuous improvement. These inputs enabled the research team to surface key similarities and differences across programs, which are described throughout this report.

Following completion of the program model maps, we then conducted semi-structured interviews with two to three program staff and leaders from each institution in fall 2025 (see Exhibit 3 for a description of participant role types). Based on recommendations from program leaders at each institution, we spoke with at least one program leader and program staff member at each institution, and in cases where more senior leaders were involved directly with program planning or implementation, we invited them to participate in interviews as well. We used the findings from the model maps to tailor the interview protocols, so that the interviews could focus on both the specific design choices program leaders made and on the why and how behind those choices. Interview questions explored institutional motivations for adopting CBE, program design choices, implementation processes, populations served, leadership involvement, and perceived challenges and facilitators.

EXHIBIT 3. PARTICIPANT ROLES

PARTICIPANT ROLE	NUMBER OF PARTICIPANTS
Senior leader (e.g., president, provost, vice president/chancellor)	4
CBE program leader (e.g., dean, director)	5
CBE program staff and faculty (e.g., manager, faculty)	2
Total	12

Following the interviews, the study team systematically coded and analyzed transcripts to identify recurring themes and cross-institutional patterns, with attention to the key phases of the implementation journey, design features, and the CBE value proposition, as described in the Conceptual Framework section. Finally, we synthesized findings across institutions to identify common implementation strategies, areas of divergence, and contextual factors shaping variation in CBE models.

ABOUT THE PARTNER INSTITUTIONS

These institutional profiles briefly introduce the five institutions that are part of this implementation study. The profiles detail each institution's background and learners and describe a set of selected CBE Program Model Map¹ design features of the institution's CBE programs.

¹ To view the full CBE Program Model Map, click [here](#).

University of Maine at Presque Isle (UMPI)

UMPI is a public 4-year university located in Presque Isle Maine. The institution first launched its YourPace CBE programs, which are offered fully online, in 2016, with the goal of addressing low college completion rates, rising student debt, and workforce readiness gaps by creating a pathway tailored to adult learners with prior college credit or work experience. Program leaders emphasized the program’s personalized, holistic academic coaching model and consistently designed course structure as defining features of the CBE programs.

CBE enrollment **2,376**



2,758

Total Undergraduate Enrollment:*

Select CBE Program Model Map Design Features

FLEXIBILITY

Federal financial aid	CBE programs are credit-bearing (sometimes called course based).
Pricing model	Subscription pricing (pay per semester/term—as many courses or competencies as a student can take).
Flexibility of pacing	Learners can adjust their pacing but are anchored to a set term end date; there is flexibility within terms, but not across terms.
Learner agency	The program establishes a fixed set of courses or competencies, but learners have agency over the order in which they complete some courses.
Initial program enrollment	Learners can initiate enrollment in the program less frequently than once a month.

COMPETENCY & LEARNING

Assessment approach	Assessments are designed and/or established primarily at the individual course or competency level.
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SUPPORT

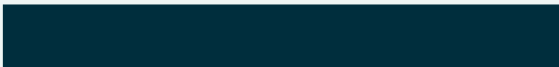
Faculty model	Course/competency content and assessments are developed at the program/faculty team level. For individual courses/competencies, individual faculty both provide instructional support and assess student work.
Coaching/ advising/ mentoring role	A professional, non-faculty coach employed by the institution is the main contact throughout a learner’s journey, providing nonacademic support and academic advising. Coaches guide students through the program, monitor their progress, maintain regular contact with students, and provide wraparound support.
Employer/ Industry Connections	Employers/industry partners serve on program-based advisory boards, provide input on competencies, offer internships and tuition benefits, and provide staff to serve as course instructors.

* Integrated Postsecondary Education Data System (IPEDS), Fall Enrollment (EF) survey component (2024).

University of Massachusetts Global (UMass Global)

UMass Global is a private, non-profit 4-year university located in Aliso Viejo, California and serving students across the country. The institution first launched its MyPath CBE programs, which are offered fully online, in 2014, with the goal of lowering the cost of higher education, increasing access to learners, and improving the credibility and quality of degrees. Program leaders emphasized the program’s flexible, low-cost design and its personalized learning experience that allows learners to focus on content they do not already know as defining features of the CBE programs.

CBE enrollment **1,800**



5,090

Total Undergraduate Enrollment:*

Select CBE Program Model Map Design Features

FLEXIBILITY

Federal financial aid	CBE programs are approved for “Direct Assessment” by the U.S. Department of Education.
Pricing model	Subscription pricing (pay per semester/term—as many courses or competencies as a student can take).
Flexibility of pacing	Learners can adjust their pacing, including completing a course/competency quicker or slower than a traditional term; flexibility within and across terms.
Learner agency	The program establishes a fixed set of courses or competencies, but learners have agency over the order in which they complete some courses.
Initial program enrollment	Learners can initiate enrollment in the program at least weekly.

COMPETENCY & LEARNING

Assessment approach	Assessments are designed and/or established primarily at the program level (all competencies).
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SUPPORT

Faculty model	Course/competency content and assessments are developed at the program/faculty team level. For individual courses/competencies, individual faculty both provide instructional support and assess student work.
Coaching/ advising/ mentoring role	A coach employed by the institution (professional, not considered qualified as a faculty member) is the main contact throughout a learner’s journey, providing nonacademic support and academic advising.
Employer/ Industry Connections	Employers/industry partners give input on competencies and assessments and offer tuition benefits.

* Integrated Postsecondary Education Data System (IPEDS), Fall Enrollment (EF) survey component (2024).

East Texas A&M University (ETAMU)

ETAMU is a public, 4-year institution located in Commerce, Texas. The institution launched its CBE programs, which are offered fully online, in 2014, with the goal of supporting adult learners in obtaining postsecondary credentials, aligned with the statewide 60x30 goal in Texas. Program leaders emphasized industry-based advisory boards that help design and continuously refine competencies and assignments and a faculty model that leverages adjunct instructors who are actively working in their fields to provide up to date industry expertise.

CBE enrollment **1,823**



9,992

Total Undergraduate Enrollment:*



Select CBE Program Model Map Design Features

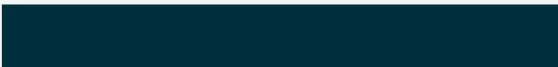
FLEXIBILITY		COMPETENCY & LEARNING	
Federal financial aid	CBE programs are credit-bearing (sometimes called course based).	Assessment approach	Assessments are designed and/or established primarily at the program level (all competencies).
Pricing model	Subscription pricing (pay per semester/term—as many courses or competencies as a student can take).	SUPPORT	Course/competency content and assessments are developed at the program/faculty team level. For individual courses/competencies, individual faculty both provide instructional support and assess student work.
Flexibility of pacing	Learners can adjust their pacing but are anchored to a set term end date; there is flexibility within terms, but not across terms.	Faculty model	
Learner agency	The program gives learners agency in terms of the set of courses or competencies they complete (similar to “electives”) and, therefore, also the sequencing of courses or competencies.	Coaching/ advising/ mentoring role	
Initial program enrollment	Learners can initiate enrollment up to a certain deadline in the term (e.g., 4 weeks into the term).	Employer/ Industry Connections	

* Integrated Postsecondary Education Data System (IPEDS), Fall Enrollment (EF) survey component (2024).

Nicolet College (Nicolet)

Nicolet College is a public, 2-year institution in Rhinelander, Wisconsin. The institution first launched its CBE programs, which are offered both online and in-person, in 2017, with the goal of bolstering enrollment and better serving the large, rural region’s working adult learner population. Program leaders emphasized the success coaching model, which is designed to provide proactive support through frequent check-ins and low case loads for coaches, as a defining feature of the CBE programs.

CBE enrollment **458**



1,384

Total Undergraduate Enrollment.*

Select CBE Program Model Map Design Features

FLEXIBILITY

Federal financial aid	CBE programs are credit-bearing (sometimes called course based).
Pricing model	Per credit.
Flexibility of pacing	Learners can adjust their pacing but are anchored to a set term end date; there is flexibility within terms, but not across terms.
Learner agency	The program establishes a fixed set of courses or competencies, but learners have agency over the order in which they complete some courses.
Initial program enrollment	Learners can initiate enrollment in the program less frequently than once a month (this option includes, for example, two specific start dates in a traditional semester).

COMPETENCY & LEARNING

Assessment approach	Assessments are designed and/or established primarily at the individual course or competency level (e.g., all faculty involved in certain competencies use the same assessments, but this may not apply to all competencies).
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SUPPORT

Faculty model	Individual faculty members are responsible for (and have autonomy over) all activities for their course or competency. The same faculty member develops course/competency content and assessments, provides instructional support to learners, and assesses learners’ work. In several programs, course/competency content and assessments are developed at the program/faculty team level. For individual courses/competencies, individual faculty both provide instructional support and assess student work.
Coaching/ advising/ mentoring role	A coach employed by the institution (professional, not considered qualified as a faculty member) is the main contact throughout a learner’s journey, providing nonacademic support and academic advising.
Employer/ Industry Connections	Employer/industry partners serve on advisory boards, give input on competencies, provide staff to serve as course instructors, and offer internships, hiring opportunities, and tuition benefits.

* Integrated Postsecondary Education Data System (IPEDS), Fall Enrollment (EF) survey component (2024).

Sinclair College (Sinclair)

Sinclair College is a public, 2-year institution in Dayton, Ohio. The institution first launched its FlexPace CBE programs, which are offered fully online, in 2012, with the goal of offering accelerated and flexible course options for working adult learners. Program leaders emphasized the institution's coaching model as a defining feature of its CBE programs, particularly the evolution of the model from a one-on-one, student-based model to a program- and ultimately team-based structure that has strengthened relationships between coaches and faculty and has enabled broader, more effective learner outreach.

CBE enrollment **1,352**



19,415

Total Undergraduate Enrollment.*

Select CBE Program Model Map Design Features

FLEXIBILITY

Federal financial aid	CBE programs are credit-bearing (sometimes called course based).
Pricing model	Per credit.
Flexibility of pacing	Learners can adjust their pacing but are anchored to a set term end date; there is flexibility within terms, but not across terms.
Learner agency	The program establishes a fixed set of courses or competencies, but learners have agency over the order in which they complete some courses.
Initial program enrollment	Learners can initiate enrollment up to a certain deadline in the term (up to 6 weeks into the term).

COMPETENCY & LEARNING

Assessment approach	Assessments are designed and/or established primarily at the instructor/faculty level at this time (e.g., each faculty member has considerable autonomy in the design of assessments).
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SUPPORT

Faculty model	Individual faculty members are responsible for (and have autonomy over) all activities for their course or competency. The same faculty member develops course/competency content and assessments, provides instructional support to learners, and assesses learners' work.
Coaching/ advising/ mentoring role	A coach employed by the institution (professional, not considered qualified as a faculty member) is the main contact throughout a learner's journey, providing nonacademic support and academic advising.
Employer/ Industry Connections	Employers/industry partners serve on advisory boards, give input on competencies, and offer internships, hiring opportunities, and tuition benefits.

* Integrated Postsecondary Education Data System (IPEDS), Fall Enrollment (EF) survey component (2024).

PROGRAM DESIGN FEATURES

Drawing on the CBE Program Model Map Framework, we focus this section on what program leaders at these institutions implemented by examining the specific design features of their CBE programs and how those features reflected three key CBE design principles: flexibility, support, and competency and learning.

Program leaders from most institutions in our sample reported that their primary motivation for launching CBE programs was to meet the needs of their learners—especially working adult learners—through flexible design features that would enable learners to make college “fit” with their lives. Program leaders often described that their typical learners are pursuing education alongside their family, caregiving, and/or work responsibilities and requiring flexibility, rather than traditional-aged learners who could organize their lives as a college learner more easily. This commitment to serving learner needs is reflected in the design decisions that program leaders made.

In terms of **flexibility**, program leaders at institutions in our sample have structured CBE programs in ways that increase learner agency over their educational journeys, including the time needed to complete programs and how they structure their learning. Most institutions offer programs that support learners in balancing their coursework with other work and family commitments and enable them to engage regardless of their location. Programs are either fully online or include both online and in-person options—with options for learners to engage with faculty, coaches, and peers—ranging from fully asynchronous to a mix of both synchronous and asynchronous opportunities. In addition, many programs, including Sinclair, UMass Global, and Nicolet College, allow learners to choose the order in which they complete courses or competencies within a defined program structure, such that learners can choose courses or competencies based on their time and interest. Similarly, programs at Sinclair, ETAMU, Nicolet College, and UMPI all allow learners to adjust their pace while still operating within term-defined boundaries, which, to some extent, allows learners to accommodate any needs they have related to their life or work.

The CBE programs also offer more start dates than traditional programs to allow learners to start when it works for their lives, ranging from twice per semester (UMPI, Nicolet College) to weekly (UMass Global). Programs’ decisions about their pricing models also reflect a focus on flexibility for learners. For example, UMPI, UMass Global, and ETAMU use subscription-based, or flat-rate fee pricing that charge learners the same amount for a period of time, regardless of how many competencies they complete. This approach, in theory, gives learners incentives to complete more competencies or credits in a time period without incurring additional tuition and fees; however, it also can have the opposite effect for learners who move at a slower pace and end up paying the same amount for fewer credits or competencies.

In terms of **support**, most program leaders spoke about design decisions on coaching and advising that are intended to support specific learners in the context of the programs' priorities regarding flexibility. For example, UMass Global and Sinclair use coaches (which are distinct from traditional academic advising) as a primary point of contact for learners; this type of coaching approach provides learners with proactive and sustained advising and nonacademic support throughout learners' journeys. Nicolet College adopted a more proactive outreach model, in which coaches contact learners at least biweekly and are embedded in departmental structures and conversations, which enables them to be more familiar with learners and their work. A senior leader described how this structure improved the learner experience by having a coach *"embed themselves in [the learners'] world versus expecting them to come to ours once again, you know that wrapping education around their lives versus the opposite."* Lastly, UMPI emphasized its large team of success coaches and the intention to preserve a *"small-university feel"* as a defining feature of its program, seeking to maintain close connections with learners.

Design choices on **competency and learning** often were reflected in how programs structured the faculty role. All programs take a traditional approach to the faculty role, where either individual faculty or faculty teams are responsible for course content development, assessment, and instructional support. For some, like ETAMU, UMass Global, and UMPI, course content and assessments are developed at the program or faculty team level (by faculty, industry experts, and/or instructional designers) with individual faculty providing support within courses. At Sinclair and Nicolet College, individual faculty are responsible for both course and assessment development and individual course support. Looking ahead, one institution, UMass Global, reported moving toward a more disaggregated faculty model for CBE programs with a distinction between instructional faculty who provide direct instruction and support and faculty who assess learners' work.

Implementation Journey

In this section, we explore the implementation journeys of these CBE programs, with a focus on understanding what program leaders and others at their institutions did, the way they approached decisions about program design and implementation, and how those decisions ultimately shaped their programs. Overall, we found that the programs in our sample followed broadly similar implementation journeys, with each program making design and implementation decisions aligned to its own mission, learner population, and local context. In the sections that follow, we explore four key phases of implementation:

- **Motivate:** How did CBE program leaders understand learner needs or pain points? What problems or challenges were they trying to solve?
- **Plan:** How did CBE program leaders organize people, processes, and resources to design and plan for CBE program implementation?
- **Launch and Iterate:** How did CBE program leaders roll out their CBE programs and refine them in response to early feedback and challenges?
- **Scale and Sustain:** How did CBE program leaders scale their CBE programs and embed them in institutional structures and policies?

We focus on key themes and commonalities across institutions' journeys in the sections that follow, highlighting specific institutional examples at each phase.

MOTIVATE

We delve into how institutional leaders first recognized a need for CBE and the problems they hoped it would address in the section that follows. We consider both internal and external catalysts that prompted leaders to consider making a change and the reasons they viewed CBE as a potential option to support such change.

Exploring CBE as a Learner-Centered, Flexible Solution

Program leaders in our sample described a range of reasons for exploring and then launching CBE programs, both internal and external to the institutions. At several institutions, leaders were driven to make a change by external influences like state policy and funding opportunities. For example, at Sinclair, the initial CBE programs were funded by a Department of Labor Trade Adjustment Assistance Community College and Career Training (TAACCCT) grant,² which provided funding and structure for Sinclair to launch its first CBE programs in computer information systems. Similarly, a statewide challenge from the Texas governor to create a \$10,000 baccalaureate spurred ETAMU leaders to explore new pathways for reducing the cost of degree completion. CBE emerged as a promising option because allowing learners to accelerate upon mastery could lower overall expenses. And at UMass Global, program leaders described a combination of leadership support, market research, and external research as motivations for exploring CBE. Senior leaders at UMass Global saw CBE as aligned with the institution's mission and values around expanding access and supporting adult learners, and targeted market research on existing CBE models administered to 1,000 prospective learners encouraged further CBE exploration. Additionally, the release of Lumina Foundation's *Degree Qualifications Profile*³ and the

² <https://www.dol.gov/agencies/eta/skills-training-grants/community-colleges>

³ <https://www.luminafoundation.org/files/resources/dqp.pdf>

American Association of Colleges and Universities' *LEAP Outcomes*⁴ provided important insights that reinforced leaders' interest in CBE. As one program leader explained, this combination *"reinforced some of the notions that we had had about adult learners, and that would be a product that we could definitely offer."*

At other institutions, the impetus for CBE came from a combination of recognizing enrollment trends and senior leadership support. For example, a senior leader at UMPI shared that the president at the time had been involved with proficiency education at the K–12 level in the state and supported them in learning more and implementing some CBE principles at the university, like outcomes-based assessments. After doing this work and becoming involved with postsecondary CBE efforts nationally, they recognized the potential for CBE to improve outcomes at UMPI:

I realized my own institution, . . . within a three or four year period, had stopped serving anybody over the age of 28, right? . . . They were gone, right? And I realized, wait, where's all the night classes, you know, where's the weekend classes that people used to teach, right? So this whole thing had happened. So I convinced my president to do competency education.

Similarly, a senior leader at Nicolet College reflected on the then-president's role in launching CBE. Nicolet College's president at the time was new to Nicolet College and had come from another institution that was already implementing CBE, and that experience and knowledge spurred conversations about *"flexibility, especially for the adult learner."* In response, they conducted market research and came to understand that although there were working adults, many who had some college credit, in the area who were interested in attending college, the rural, remote nature of the college's large geographical region often created barriers for adults to finish their degrees. For example, learners faced long and sometimes hazardous commutes to campus across the college's large, rural geographical region, and high underemployment rates often required learners to work multiple jobs. For program leaders at Nicolet College, supporting socioeconomic mobility in this context was key. They realized that providing more flexibility could help increase access for many learners in the region who had expressed interest in Nicolet College and sometimes even filled out an application, but that ultimately faced barriers to enrollment.

Overall, program leaders in our sample reported an interest in CBE programs regarding their learners' need for flexibility that would enable them to balance education and life commitments, as well as a commitment to creating an environment where learners feel that *"someone wants them to get a degree."*

⁴ <https://www.aacu.org/publication/making-liberal-education-inclusive-the-roots-and-reach-of-the-leap-framework-for-college-learning>

Motivate: Key Takeaways

- Internal and external factors catalyzed institutional leaders' interest in exploring CBE, including declines in enrollment, a desire to meet the needs of working adult learners, needs of the local community and workforce, and state level policy contexts.
- For leaders at most institutions, CBE offered an opportunity to improve access, affordability, and support for their learners, many of whom are working adult learners.
- Institutional leaders saw CBE program design as a way to better support their learners, by offering a more flexible, outcomes-focused approach that was relevant to learners' lives.

PLAN

Here we examine how program leaders developed plans for CBE program design and implementation by organizing people, processes, and structures needed to build and launch programs. We start with a discussion of the role of executive sponsorship, considering how institutional leaders set direction for CBE programs aligned with institutional strategy and helped legitimize CBE as a key institutional priority. We then describe how program leaders built buy-in and trust among faculty and staff, especially in cases where they were met with skepticism and resistance early on. Finally, we explore how program leaders worked with departments and units across their campuses to enable collaborative planning and shared ownership, identify potential friction points, and organize the systems and processes required for CBE implementation.

Setting Direction Through Leadership Support

Across institutions, interviewees highlighted the importance of senior leadership acting as visible champions for CBE. Senior leaders did this in several ways: by becoming directly involved in program development and teaching, allocating resources to support initial planning, and clearly articulating motivations for implementing CBE.

Direct involvement in early program development and teaching was one of the most visible ways that senior leaders championed the work. At ETAMU, a program leader involved in early planning described how the institution's president at the time, along with program leaders, taught CBE courses during early implementation, which enabled faculty to see that *"we weren't just going to throw them out there, that we were going to be there too, to support them and find out how it went."* Similarly, at UMPI, both the president and the provost developed and taught some of the first CBE courses. A program leader described how their involvement gave them firsthand insight into the experience of working in a CBE program and enabled them to show informed support for the program, saying, *"that's really helpful to*

have senior leadership that's been in those roles because then they understand what the students are like and what the courses are like . . . and the dynamics and how the CBE modality works."

Senior leaders also supported planning by committing institutional resources. At ETAMU, senior finance leadership visibly supported CBE with the initial \$250,000 investment in the program, and at Nicolet College, a senior leader spoke about the importance of resource allocation to demonstrate support for CBE:

I think in so many ways all you have to do is follow the money, if your budget is a reflection of your priorities. And I mean you see we have a pretty robust instructional design team for a college our size. So you see [in the budget] a lot of support to faculty to help them along this journey.

Senior leaders' role in clarifying institutional motivations for exploring CBE helped staff understand the problem they were trying to solve. At Nicolet College, for instance, staff recalled an all-college meeting where the president laid out the institution's options in the face of enrollment decline: identify new opportunities for enrollment or prepare to "*shrink as a college gracefully*." This framing helped to proactively frame the motivation for CBE as a shared project for staff and faculty and "*made people way more aware of the situation at hand and that you know we really do need to look at what are some opportunities within our district*."

Although visible support and engagement from senior leaders was valuable, program leaders also reflected on how the degree to which senior leaders supported staff autonomy in program development also played a role in attitudes toward CBE implementation. For example, a senior leader at Nicolet College described the involvement of the president during initial CBE planning, noting that although the president's support was strong, it also was "*maybe a little heavy-handed, and that there was probably not as much collaborative decision making*" in terms of how the program would be designed and implemented. They continued to reflect that many staff at the institution "*felt they didn't really have a voice in this direction*," leading to lower buy-in for CBE.

Addressing Early Resistance and Buy-in Challenges

Across institutions, program leaders described challenges related to the ways that CBE program design can change the role of faculty—particularly in thinking about how to develop programs that fairly compensated faculty and balanced their workload, while also addressing their skepticism about instructional quality.

At Sinclair, a program leader described a mismatch between faculty expectations about CBE learners and the reality of teaching in the program, both in terms of pedagogy and workload. Many faculty members initially expected the learner profile in the CBE program to be the *“type of student who is coming in with knowledge, who can accelerate quickly, who doesn’t need a lot of guidance, a lot of support, a lot of help.”* They came to realize, however, that the learners required more one-on-one support from faculty than they had anticipated. Another Sinclair program leader shared that expectations for faculty grading represented a redistribution of faculty workload; faculty are expected to grade fewer assignments, but more frequently, rather than many assignments less frequently. With regard to skepticism about instructional quality, an ETAMU program leader shared an example of faculty skepticism of CBE design. Faculty were concerned that program design that allowed learners to accelerate and take more courses per term than traditional programs would limit quality. They said,

That was, for some faculty, unheard of. How can they possibly complete that many and do it well? And so they had to experience that and see the level of the quality of work that the students submitted before they actually would accept that.

In this case, program leaders’ commitment to flexibility as a core design priority shaped how they engaged with faculty to make the case that increased flexibility did not lead to reduced quality automatically.

Many program leaders also described resistance from other departments and units on campus, such as financial aid or IT. This resistance was often rooted in hesitance to change and doubts that changes would be possible or worthwhile. For instance, a program leader at Nicolet College reflected on working with financial aid, saying *“the response was always ‘the feds aren’t going to let us do that.’”* Similarly, a program leader at ETAMU shared that the design of the program made integration with financial aid systems challenging; the existing systems were not equipped to accommodate shorter terms within a traditional semester, meaning processes needed to be manual at first. Some operational resistance also stemmed from the timing of other departments’ and units’ involvement during CBE program planning. A Nicolet College program leader reflected on this lesson, saying *“We jumped into this with both feet and really just focused on the academic side”* at first, and in retrospect realized the importance of understanding the appropriate time to engage other units *“from financial aid to registration to again advising and so many of those other folks that . . . we need to stand hand in hand for successful student experience.”* Some CBE programs have opted to build some of their own infrastructure for programs outside centralized offices, which can enable quicker and more tailored CBE support but may limit information flow and engagement with the rest of the institution. For example, a program leader at ETAMU shared that having an admissions process and advising team separate from the rest of the university may have hindered others on campus from fully understanding CBE.

CBE program leaders worked to mitigate challenges with buy-in by educating campus constituents about CBE and its value for learners, as well as engaging faculty champions for the work. For example, at UMPI, when science faculty members were hesitant about whether their courses could be delivered in a CBE format with labs, leaders met with faculty who expressed concerns and collaborated with them to *“brainstorm ways that they can now do this.”* As a result, a program leader shared that faculty began identifying strategies to implement labs in CBE, which enabled them to *“wrap their heads around this idea of ‘we can do this in this modality’”* more concretely. Another approach some program leaders shared was ensuring that faculty and staff understood that CBE programs were often attracting learners who otherwise would not have enrolled at the institution. A Sinclair program leader described how they were intentional about communicating the program’s potential to boost enrollment, which was *“a very attractive strategy”* for many individuals at the college:

Students are always trying to start classes after the term starts, and you’re either rushing to get them in at the last second or even after the term starts. In some cases, they’re three days late to class and we’re still putting them in classes. Or you’re telling them you can’t start until four months from now, and that’s not necessarily a great way to capture the momentum that a lot of students feel when they’re eager to get started on something new. And so if we at Sinclair were the only ones offering CBE programs with start dates every two weeks in the area, that allowed us to capture a lot of the students that would typically be wanting to go elsewhere, but they want to start right away. So maybe they start at Sinclair instead.

CBE program leaders also were intentional about using faculty development opportunities to help build support. For example, program leaders at Sinclair recognized that it was difficult for faculty to *“conceptualize how content in a face-to-face classroom that will immediately translate to a CBE modality.”* To address this, they decided to develop CBE programs only in courses that were delivered in the online modality already, so that the existing online course maps and alignment between activities, assessments, and learning outcomes, which mirrored more closely the structure of CBE, were already in place. This helped faculty see that *“the content is going to remain the same; it’s just the way that you deliver the content is going change.”* The institution also offers faculty training in a competency-based format, which makes it *“applicable to their real life experiences”* and helps them understand the learner experience in CBE programs. UMass Global took another approach to faculty development, bringing in *“a lot of external expertise helping us on the [instructional] design piece,”* to help build out the initial parameters of the academic and business model, including the unbundled faculty model, in collaboration with UMass Global faculty. This helped to mitigate the learning curve that instructors often face in course design for CBE.

Engaging faculty champions was another key lever for many program leaders working to address buy-in challenges. For example, at ETAMU, a program leader described how they engaged faculty who were seen as influential within their departments to help bring other faculty on board:

I think that that we were very strategic and the faculty we selected, and I use this term [often] used in Texas, we got our “bell cows.” It’s a term that those are the ones that whatever they say, they lead the pack or the herd. And so it might not always be positive, but they’re viewed as the leaders of their academic departments.

Similarly, a senior leader at Nicolet College reflected on the key role that faculty who were willing to take risks played in building momentum, noting that the transition was “so mindblowing to many college employees, faculty and staff alike” that they focused on engaging

early adopters who were willing to just take a chance on this, and just trust in us that we are going to go on this journey together. If we fail, we fail together, and we’ll return to the way we used to do things. If not, what a cool, what a cool thing you have just done to be this kind of pioneer in this kind of work.

Supporting Planning With Cross-Functional Teams

Once program leaders had begun to build campus understanding, particularly among faculty, planning often shifted toward leveraging cross-functional teams and committees within the institutions as well as collaborative learning with external partners. These structures also supported a sense of shared ownership and helped with friction related to limited buy-in.

Many CBE program leaders discussed creating steering committees and cross-functional teams, bringing together staff from across academic and business units. For example, a Sinclair program leader emphasized the importance of holding consistent meetings and maintaining open lines of communication during the initial rollout of the program to keep all involved staff informed and engaged. These meetings included participation from faculty and representatives from learner services, institutional research, financial aid, the registrar’s office, IT, and marketing, and allowed participants to better understand how CBE programs would affect their work. “*We needed to get essentially everybody that would be affected at the table to talk about the strategy for this program,*” they explained. Similarly, a Nicolet College program leader discussed biweekly “*larger scale college meetings*” sponsored by leadership that encourage staff and faculty to raise questions and potential challenges.

Many program leaders also found value in engaging with and learning from external experts as they planned for CBE implementation. Externally, program leaders involved in the planning stages described

benefitting from shared learning opportunities with those at other institutions that had already established CBE programs to better understand program structure. Program leaders at Nicolet College, for example, described talking to and visiting program leaders at other institutions that had already begun implementing CBE to “*pick their brains*.” Staff and faculty from Nicolet College’s welding program visited another institution, where they shadowed their counterparts to observe student flow in the lab, ask operational questions, and interact directly with students, which directly influenced how they designed the physical space for Nicolet College’s CBE welding program. Program leaders at Nicolet College also signed a memorandum of understanding with this other institution that allowed them to share curriculum with each other.

Many interviewees also reflected on the value of shared learning and technical assistance from the Competency-Based Education Network (C-BEN) and attending field events like the annual CBExchange conference.⁵ In one example, a senior leader at UMPI reflected on the value of being connected to C-BEN and other institutions early on: “*what was really helpful to me is being part of C-BEN and having those linkages with what I would call some of the early adopting schools in C-BEN that did that work.*” Additionally, ETAMU collaborated with another college in Texas, first to submit a grant proposal for funding to pilot CBE (which they were awarded) and then throughout the planning phase to share resources and prepare for launching CBE programs.

Plan: Key Takeaways

- Executive sponsorship was key in the early planning stages. Support from institutional leaders helped clarify goals and motivations for CBE and legitimized the work, thus improving buy-in and building momentum.
- CBE program leaders mitigated early skepticism from faculty and staff by building intentional cross-campus engagement, case making about CBE, and incorporating faculty development opportunities into the planning process.
- CBE program leaders emphasized the importance of cross-functional collaboration in the planning process, as CBE affects a broad set of academic, administrative, and learner facing systems across the institution.

⁵ C-BEN is an organization that works with postsecondary institutions, employers, and state agencies to support education and workforce development efforts that “meet the needs of both learners and employers, ultimately creating skills-based systems that recognize people for what they know and can do.” C-BEN hosts the annual CBExchange conference, which “brings leaders together to learn from one another, make sense of change, and move from ideas to action” and offers opportunities for shared learning and field building. For more information about C-BEN and CBExchange, visit: <https://www.c-ben.org/>.

LAUNCH AND ITERATE

We examine in this section how program leaders launched their CBE programs and refined them through ongoing cycles of iteration. We begin by describing how efforts at most institutions started small, with pilots or smaller initial cohorts. We then discuss how, through launching programs, program leaders surfaced and addressed challenges, especially related to aligning CBE program design choices with existing institutional systems and policies. Finally, we consider how program leaders approached continuous improvement and iteration, relying on learner feedback, faculty insights, and performance data to adjust course structures, policies, and operational processes over time.

Starting Small at Program Launch

CBE programs at most institutions in our sample started small, launching with a single program or piloting CBE models with smaller learner groups. This gradual approach, which typically spanned 1-2 years, enabled them to test their approaches, build internal capacity, and continue to foster trust and buy-in throughout the process by engaging staff in the process and demonstrating early wins. For example, UMass Global began with a limited pilot cohort of about 50 learners and offered free tuition to those who enrolled. Because they also were launching with a new learning management system (LMS) and a new approach to curriculum development, the pilot cohort gave them space to understand how these new features worked in practice. Nicolet College took a similar approach, beginning with a single course pilot of about 15 learners in welding. The pilot experience allowed them to solicit feedback from learners about their overall experience and interest in CBE as well as their perspectives on grading scales. They later learned that not all takeaways from the small pilot cohort would be applicable college-wide (e.g., learner goals in workforce training programs were sometimes different from learner goals in other disciplines). At other institutions, like Sinclair, ETAMU, and UMPI, program leaders described launching with one full program in a single discipline; although these were larger scale launch efforts, they still provided important inputs that informed later iteration.

In addition to decisions about the scale of the launch, program leaders also had to make choices about which disciplines or courses they would start with, which were driven by both external and internal considerations. First, program leaders at several institutions chose programs based on alignment with employer needs and workforce relevance. For example, program leaders at UMPI convened a focus group of local employers to identify in-demand skills and program areas, using that input to shape their first CBE offering. Nicolet College selected welding as its pilot program in part because it was already aligned with American Welding Society standards, which provided a clear framework for defining competencies and assessments. And UMass Global launched with a bachelor's degree in business administration, a program that already had strong enrollment and was seen as particularly relevant for

working professionals with experience in management roles. This decision also was informed by findings from a survey of 1,000 prospective students, which helped program leaders to refine initial assumptions about CBE business models and identify the most appropriate degree programs for initial implementation. These choices reflected a desire to ensure that early CBE programs would be attractive to both learners and employers.

Internal considerations, like potential ease of converting programs and anticipated faculty buy-in, also drove choices about initial program disciplines. As described previously, Sinclair focused on developing programs that were being offered already in an online format given the similarities in course structure between online and CBE courses, and UMass Global similarly began with a program that was already well-established at the institution in traditional format. A UMass Global program leader also shared that another reason they chose to launch with the bachelor's degree in business administration was that faculty in the School of Business and Professional Studies, where this program was housed, were more open to innovation due to the nature of the field: *"I would say that's probably why they choose chose the School of Business and Professional Studies to start because we . . . embrace new technology if we're telling our students that they need to."* The program received support across faculty in two academic schools, which was essential for developing both general education and business competencies.

Navigating Administrative Systems and Policy Challenges

As they launched their CBE programs, program leaders often had to navigate challenges with administrative systems and policies that were not designed to support CBE programs, including financial aid, accreditation, and faculty role and compensation.

The most common barrier that program leaders described was working with financial aid offices and ensuring compliance with federal financial aid requirements. For institutions with CBE models that maximized learner flexibility in their design, like nonterm based or direct assessment models, program leaders described challenges with aligning their programs with federal financial aid regulations. For example, program leaders at UMass Global had to navigate the process of securing Title IV approval for direct assessment, which involved extensive cross-functional collaboration within the institution. A program leader described the scale of the effort, saying:

It was trying to develop a mini university within the university, because you're basically developing all new policies. Every facet of the university had to be involved to provide their input about how a process would be changing to support nonterm enrollment. In order for it to move forward, there really was a concerted effort to have an academic affairs lead working with an IT

lead and then financial aid lead to work together to make sure all the different moving pieces were going forward to meet the launch date.

UMass Global also needed to “*transition the entire university to a new financial aid system*” to support financial aid disbursements in the self-paced, direct assessment model. Program leads shared that there was initially “*hesitation*” from the financial aid office with changing to a new system, especially because few other institutions at the time were receiving direct assessment financial aid, there was “*less of a community to ask questions.*” To support this effort, the Chief Financial Officer (CFO) established a project management office (PMO) to assist the operations team. The PMO worked closely with operational leads across the institution, including the financial aid team, to encourage departments to “*think outside the box*” and move forward in planning discussions. Given that the CBE initiative affected all facets of the university, the PMO played a key role in facilitating cross-departmental collaboration and buy-in.

Financial aid policies also sometimes limited the extent to which programs could implement flexible design features. At Sinclair, for instance, program leaders initially proposed a highly flexible enrollment model that enabled learners to enroll in courses at any point during a time, which was not feasible given the institution’s existing financial aid systems. Financial aid staff pushed back but ultimately collaborated with program leaders to develop a modified structure that built on Sinclair’s existing “flex terms”—condensed 8- and 12-week terms—by essentially creating more frequent enrollment periods that would function in the same way that the existing flex terms did. This enabled more flexibility for learner enrollment while maintaining compliance with existing financial aid policy at the institution that required learners to complete by the end of the standard semester.

Beyond navigating federal financial aid requirements, several program leaders encountered challenges because financial aid staff were not involved early in the CBE planning process. At Nicolet College, for example, academic teams moved forward with program design before engaging financial aid, which program leaders described as leading to delays and confusion when it came time to implement. Because financial aid staff were not involved in early planning, they were unfamiliar with the structural changes required by the CBE model and had to catch up quickly.

CBE program leaders also described lengthy and often challenging experiences with gaining accreditation for new CBE programs, especially given that many institutions were launching CBE at a time when accrediting bodies were less familiar with CBE as a model. A common theme was the need to

navigate substantive change processes⁶ to gain approval for new program structures that deviated from traditional credit-hour and term-based formats, which involved considerable time and effort. Program leaders at ETAMU and UMPI described year-long processes where they worked with accreditors to align their program design choices with accreditors' expectations. For example, UMPI structured its CBE courses around three-credit units and included summative assessments to ensure alignment with traditional academic standards. Some program leaders noted that once they had launched one or two CBE programs successfully, subsequent approvals became easier. Program leaders at Nicolet College, for instance, described how gaining approval for their first two programs through the Higher Learning Commission allowed it to streamline future CBE program approvals under a simplified process for institutions with demonstrated capacity.

Determining Faculty Roles and Compensation

As leaders launched their programs, they also had to make decisions about faculty roles. Several program leaders reported approaching the faculty role in ways that moved toward a team approach to curriculum development. For example, program leaders at ETAMU described working with industry-engaged adjunct faculty, in collaboration with an industry advisory board, instructional designers, and a smaller number of full-time faculty to drive curriculum development. Program leaders reported that this approach supports cost effectiveness and allows the program to stay closely aligned with industry needs. Lead faculty provide oversight for curriculum development and make iterative adjustments to curriculum as needed and aligned with industry needs. Similarly, at UMPI, full-time lead instructors oversee curriculum quality and ensure consistency across part-time instructors.

Finally, some program leaders highlighted challenges in determining the best way to compensate faculty for teaching in CBE programs. At Sinclair, for example, CBE programs began with a per-learner pay model, because institutional policy dictated that courses with very low enrollment (i.e., three-to-four learners) did not meet the minimum threshold for faculty pay. As a result, faculty teaching early CBE courses at Sinclair were compensated per learner, which disincentivized faculty participation. As enrollment grew, however, they could revise the pay structure such that faculty would be compensated on par with traditional courses, which one program leader described as “*a huge win for pay equality and also . . . encouraging faculty to be a teacher in this program.*” In another example, program leaders at Nicolet College had to account for additional faculty compensation when the CBE welding program

⁶ Substantive change processes are put into place by accrediting bodies and require institutions to apply for approval or notify accreditors when making changes to programs or operations, which CBE program implementation entails. For an example, see: <https://www.hlcommission.org/accreditation/cycles-and-processes/substantive-change/>

expanded into local high schools through dual enrollment because instructors were required to travel and teach in person at high school sites.

Refining Supports in Programs Designed for Flexibility

Across institutions in our sample, flexibility emerged as a defining design principle of CBE programs. Program leaders described making design decisions to meet the needs of their learners by offering flexibility, while also reflecting on some of the challenges that arose in implementing such features.

Program leaders emphasized that although flexibility is a core design principle in their programs and offers more learner autonomy, it also complicated the design choices they made about learner supports. They found that some learners require additional structure, more direct support, or both, to be successful. In response, program leaders shared examples of how they balanced flexibility and learner autonomy with additional structure or support to provide options that met learners' different needs. Nicolet College, for example, implemented a hybrid "CBE Flex" modality that combines competency-based instruction with cohort-based progression in selected courses. This adjustment emerged from qualitative feedback indicating that some learners benefited from greater structure and peer collaboration, while still preserving the option for fully self-paced progression for learners who preferred maximum autonomy.

Program leaders also emphasized the importance of proactive communication and engagement with learners in flexible learning environments, especially when learners experienced challenges with time management or communicating with faculty. Program leaders at some institutions reported instituting policies with regard to response times (e.g., ETAMU requires faculty to respond to learner inquiries within 24 hours, even on weekends). Others shared examples of outreach strategies, like reaching out to learners via phone, email, and text, or sending standard proactive communications at fixed time periods throughout the term.

CBE program leaders also focused on preparing learners for participating in CBE programs and providing ongoing support after they enrolled. For example, Sinclair program leaders shared that learners complete a required orientation before beginning their CBE coursework, during which they are asked why they chose to enroll in a CBE course rather than another modality, an activity that also serves as an initial assessment of learner readiness. Learners also receive automated emails that update them on their progress throughout the term, and a back-end monitoring system developed by institutional research staff provides real-time snapshots of learner progress to success coaches that enable them to provide targeted, proactive support. Similarly, at UMPI, learners are assigned a dedicated success coach from their first session through program completion. Success coaches support learners with course navigation, program or concentration changes, time management, and degree planning, and they assist with

graduation readiness as learners approach completion. Coaches are assigned by program area, enabling them to specialize in specific disciplines and provide more targeted support.

Addressing Challenges Related to Program Growth

Once programs were up and running, program leaders across institutions described iterations and adjustments they had to make as the scale of enrollment increased. As described previously, most institutions in our sample started with small pilot cohorts or single programs. As they encountered challenges with institutional systems and processes, they often began with manual workarounds but eventually found those to be unsustainable as programs grew. Program leaders described moving from initial manual solutions to exploring options for automation and leveraging cross-functional collaboration to identify solutions.

For example, as CBE programs scaled at ETAMU, program leaders initially relied on manual processes to manage financial aid and registration for its 7-week CBE terms. As enrollment grew, these processes became challenging to maintain manually. In response, the institution transitioned from manual processes to automated systems and expanded cross-departmental involvement from units like financial aid and the registrar to make ongoing program operation more sustainable. As one program leader described,

The delivery is very different. It's a seven week term, and so there are two [terms] in each long semester and financial aid systems are not equipped to handle that. So everything became a manual process at that time with huge spreadsheets, and of course as we've scaled now . . . [we] had to automate [many of those processes]. It just became too cumbersome. And then we involved registrars, the director of student accounts, financial aid officers.

Similarly, UMPI's CBE programs operate on a subscription-based model with multiple start dates throughout the year to allow for continuous enrollment, but the learner information system, which serves seven institutions in the state system, was built for traditional semester-based scheduling, making it difficult to manage entering and tracking learner information on a rolling basis. This meant that program leaders had to identify ways to work around or override the system. Program leaders have continued to do this as the programs have grown and reported that engaging a cross-functional “*matrix group of people*” who were in similar roles in their respective offices has been helpful in advancing change.

Collecting Feedback and Making Iterative Improvements

Program leaders at institutions in our sample consistently described iterating on their program design after the initial program launch, informed by quantitative data and qualitative feedback they sought on an ongoing basis from staff, faculty, and learners.

Several program leaders shared examples of qualitative feedback they collected from learners, faculty, and staff. For example, UMass Global program leaders described using competency-level surveys, course evaluations, and semiannual learner satisfaction surveys to collect feedback from their learners. And at Nicolet College, leaders developed an initial grading limited to B, D, or F, based on insights from the small group of learners in the pilot cohort. As they expanded CBE programming, however, they learned that some learners felt limited by this grading system, as earning an A was an important factor for scholarships and Dean's list eligibility. Based on this feedback, program leaders at Nicolet College revised the grading structure to allow for the possibility of earning an A by introducing additional assessments or modifying existing ones to reflect a higher level of mastery. Program teams also relied on rolling, informal feedback that arrived through learner emails and shared inboxes to identify emerging issues in real time. Mechanisms like advisory committees and ongoing cross functional meetings provided avenues for faculty and staff to give feedback as well. UMPI, for instance, uses a standing advisory committee that meets monthly throughout the academic year to collect feedback from faculty and staff across campus, where they come together *"to offer their suggestions about YourPace [UMPI's CBE programs] or to hear about updates or initiatives . . . and provide feedback to us."*

Program leaders also used quantitative data to inform program iteration and improvement. For example, program leaders at Sinclair reviewed prior learning assessment data and discovered that learners were completing parts of a proficiency exam without receiving credit if they did not pass the entire exam. Program leaders responded by pairing the exam with the CBE course so that learners could earn credit more efficiently, reduce redundant effort, and avoid paying for both the exam and the course. Program leaders at Sinclair also described how CBE programs began with a minimum GPA requirement of 3.0 for learners to enroll themselves in CBE programs, with an option for staff to manually enroll learners with lower GPAs on a case-by-case basis. After analyzing completion rates across GPA ranges (2.0, 2.5, 3.0), program leaders at Sinclair found minimal differences in learner completion as long as learners maintained a GPA above 2.0. Consequently, they decided to lower the GPA requirement for learner enrollment in CBE courses to 2.0, a change that program leaders said reduced barriers for learners and increased efficiency for staff. And at ETAMU, an enrollment funnel dashboard allowed staff to detect and resolve application system errors that had previously prevented learners from completing their applications, illustrating how small system fixes contributed to smoother onboarding. As one leader noted, *"Nobody knows that we're doing that when we fix some kind of weird little application link. But those are the things that help us do the big things."*

Finally, Sinclair's coaching model provides an example of a program design feature that has been through multiple iterations since launching, based on feedback from staff and faculty. The program began with a learner based, one to one model, but coaches reported that this model required them to *"have an*

awareness of what was happening in 80 different courses” and they struggled to find solutions for issues that arose with learners—“you didn’t really know where to look.” In response, Sinclair shifted to a program-based model where coaches became experts in specific programs, which helped improve relationships between coaches and faculty because faculty now had dedicated coaches they could contact. Following this change, as program enrollment continued to grow, Sinclair moved to a team-based model in which teams of coaches were working with programs to serve learners. The team-based approach enabled coaches to work also with faculty to support course design and development and ensure courses run smoothly. A program leader shared that this move, although it met with some initial hesitation from faculty, enabled them to

impact a lot more students in the long run than we were in our previous model and we’re still providing support for those students communications. . . . I also think it’s helped faculty be more confident in themselves and answering questions that students may have come to us for in the past.

At other institutions, program leaders described iterations that were based on operational needs, rather than direct feedback. For example, some program leaders discussed changes they had to make to their LMS. UMass Global initially launched its CBE programs using a third-party LMS developed by Flat World, which was specifically tailored to support self-paced, direct assessment models. Over time, the institution transitioned both its paced and self-paced programs to a different LMS provider, Desire2Learn (D2L). This shift was part of a broader institutional effort to streamline the learner experience and address limitations in the original LMS, especially after Flat World ceased operations. Sinclair also transitioned from its previous LMS, D2L, to Canvas. The move was motivated in part by the need to improve the learner experience in CBE courses. Program staff noted that the existing LMS lacked features that would help learners understand their progress and navigate course content effectively. For example, in D2L, learners could not see why content was locked or what they needed to do to unlock it. In contrast, Canvas provided clearer visual cues and more intuitive navigation for learners in self-paced environments.

Launch and Iterate: Key Takeaways

- CBE program leaders typically launched with small pilots that allowed program leaders to test design choices, identify challenges early, and refine their approaches.
- Early program launch often revealed system and policy challenges, especially related to aligning a flexible model like CBE with financial aid and accreditation policies and determining faculty role and compensation. Program leaders described often beginning with manual solutions and workarounds that eventually required more automation as programs grew.
- Program leaders described using qualitative feedback from learners, faculty, and staff, as well as quantitative learner outcomes data, to inform iterations and improvements to programs over time.

SCALE AND SUSTAIN

In this section, we examine how program and senior leaders at institutions in our sample worked to scale and sustain CBE programs after initial launch. We highlight how programs expanded in size and scope and the strategies program leaders used to embed CBE into broader organizational structures.

Growing and Institutionalizing CBE Programs

Program leaders at all institutions reported growth in their CBE programs, both in terms of number of programs and learner enrollment. For example, Sinclair has scaled to 11 active programs, and ETAMU currently has 8 undergraduate and 1 graduate program with more than 1,800 learners. Program leaders at Nicolet College also shared that the institution has a goal of creating 1 new CBE program per term aligned with learner and industry needs, and UMPI is working with the state system to expand CBE to other institutions in the state. Some program leaders also described improved learner outcomes. For example, a Sinclair program leader reported that learners in CBE programs tend to complete faster than those in traditional programs.

As programs have grown, leaders have taken steps to institutionalize CBE. At several institutions, for example, program leaders made decisions about creating dedicated colleges or units to house CBE programs. ETAMU created a dedicated College of Innovation and Design to house most of its CBE programs and is working actively to integrate CBE into broader university processes. A program leader reflected on the move to house CBE in this new college after the initial program launched, saying that it was

a cue to everyone of like, oh, this is not going anywhere. We want to do more of this, right? Because it's really resonating with our students. You're talking about gradual and sustained growth in programs when other programs were seeing either stagnation or decline.

Sinclair also embedded its CBE offerings within a centralized e-learning division, helping to streamline operations and support. In contrast to ETAMU, this was a decision that program leaders made when launching the program; however, they remarked on how this continuity has helped them feel “a *strong sense of ownership*” over the programs as they have grown.

Several program leaders reflected on the role of continued leadership support and relationship building in scaling and sustaining CBE programs. As described in the Plan section, leadership support and executive sponsorship were key facilitators for program planning and launch, and program leaders shared that this support remains important, especially given the challenges with systems and processes they encountered as their programs grew. As a program leader from UMass Global said, “*it does require senior leadership support and active support even now to evolve what we’re doing.*” At UMPI, the president continues to be a vocal supporter of scaling CBE and even continues to design and teach programs. And at Nicolet College, the president has set an expectation that CBE should be the default modality for new programs:

When new programs are proposed and developed at Nicolet College since I became president, I request that the faculty and Deans prove to me why it can't be CBE. So in my opinion, I have a baseline. New programs are going to be CBE unless proven otherwise.

In another example, a program leader at ETAMU emphasized the value of relationship building with business units across campus, as they recognized continued scaling would increase workloads across those units. These efforts led to more support for CBE across campus over time:

I think where we’re at now is just the outcome of continuing to work with and honor the people at our institution, recognizing that we’re asking for changes . . . it’s part of who we are now as an institution.

Scale and Sustain: Key Takeaways

- CBE program leaders reported steady growth in CBE programs and enrollment, with several expanding to multiple programs and thousands of learners.
- As CBE scaled, program and institutional leaders described efforts to institutionalize CBE programs, like creating dedicated colleges, embedding CBE in online divisions, or unifying systems like LMS platforms.
- Continued visible support from senior leaders helped reinforce CBE as a strategic priority, which is an important component of ongoing change management required to support growth of CBE programs that operate differently than traditional programs.

CONCLUSION

This report highlighted the experiences of CBE program leaders at five postsecondary institutions as they planned, implemented, and scaled CBE programs on their campuses. **Overall, we found that, although program leaders made a range of different design choices and navigated unique challenges, key commonalities existed in how they approached implementation and managed the substantial change it required.** Key takeaways include:

- **Program design features:** CBE programs were designed primarily to meet the needs of working adult learners through flexible design features that would enable learners to make college “fit” with their lives. This commitment to serving learner needs was reflected in the design decisions that program leaders made about flexibility, competency and learning, and supports for learners.
- **Motivate:** Leaders at institutions were motivated to explore CBE as a strategic response to both internal and external factors like enrollment declines, workforce and community needs, and state policy contexts—though the specifics varied by college. They commonly saw CBE as a way to expand access, affordability, and relevance for the working adult learners they sought to serve.
- **Plan:** Effective planning for CBE required visible executive sponsorship to legitimize the work, intentional strategies to build faculty and staff buy-in, and robust collaboration and engagement with cross-functional teams who were critical to implementing CBE successfully.
- **Launch and iterate:** Program leaders typically launched with small pilot cohorts or single programs that enabled them to test design choices and uncover early challenges, especially related to adapting systems and processes and balancing learning autonomy with structure and support in a flexible learning environment. Program leaders often developed initial manual workarounds before moving toward more scalable solutions; they also described using qualitative and quantitative data from learners, faculty, and staff to iterate and improve their programs. Across institutions, iterations to programs were small and incremental with a focus on improvement without shifting priorities away from core design principles, especially flexibility.
- **Scale and sustain:** Program leaders reported steady growth in CBE programs and enrollment, with several expanding to multiple programs and thousands of learners. As their programs scaled, program and institutional leaders described efforts to institutionalize CBE programs, though they took different approaches. Approaches included creating dedicated colleges, embedding CBE in online divisions, or unifying systems like LMS platforms. Continued visible support from senior leaders helped reinforce CBE as a strategic priority, which is an important component of ongoing change management required to support growth of CBE programs that operate differently than traditional programs.

These findings point to several implications for institutions that are considering, planning, or in the early stages of CBE implementation.

Recognize and plan for the substantial change management required for CBE implementation:

As the implementation journeys we explored in this report demonstrate, developing and implementing flexible CBE programs requires institutions to make substantial changes to business processes, faculty roles and approach, learner supports, and technology systems. The scope and scale of these changes makes a structured and thoughtful approach to change management essential. Leaders highlighted the importance of strategies such as visible senior administrative support, collaborative leadership, flexible planning, phased implementation, and sustained professional development to help staff understand shifting expectations, adapt workflows, and build a shared sense of ownership.

Institutions planning for CBE should integrate change management into their implementation strategies intentionally by identifying the cultural, operational, and role-based shifts that CBE will require, and by creating structures that support staff through those transitions. For a targeted exploration of change management in CBE implementation, see AIR's recent [minibrief](#) that highlights the change management strategies our partner institutions took in their implementation journeys.

Engage with others at your institutions early and intentionally during the planning stages:

Program leaders across institutions emphasized that successful CBE implementation requires intentional planning, broad engagement with units across the institution, and sustained leadership support. As one program leader noted, building a CBE program is not simply a course development effort but rather the creation of a “mini university within the university,” requiring coordination across academic, administrative, and support units. Program leaders also highlighted the need to give staff time and flexibility to experiment and refine their approaches, as well as the importance of using communication structures like advisory committees or cross functional teams to facilitate feedback and continuous improvement.

Institutions interested in implementing CBE should work to identify key constituents across campus who can support CBE implementation, as well as those whose work will be affected by such efforts, providing them time and space to learn about CBE and adapt to the new model. Institutions also can consider potential operational and policy challenges, like navigating accreditation and financial aid, and incorporate the time and opportunities for leaders in those areas to meet and address those into their plans.

Integrate CBE into existing systems and/or develop new ones: As we described in this report, many program leaders described challenges with integrating CBE programs into existing institutional systems that were not built with the flexible structure of CBE in mind. For example, many program leaders described beginning with manual workarounds to accommodate CBE program elements like frequent or rolling start dates; however, they came to learn that those manual solutions became unsustainable as programs scaled.

Institutions that are considering or planning CBE should account for existing systems on campus in their plans, thinking through how CBE programs will or will not function in those systems. If new or adapted systems are needed, working with business units on campus like Information Technology and Institutional Research may help align CBE program characteristics and systems earlier on in the implementation process and reduce challenges later on as programs grow.

Learn from other institutions and leverage support networks: Program leaders often reflected on the important role that consulting external experts and learning from peer institutions played in their CBE planning and implementation. Many described benefitting from shared learning opportunities with colleges that had already launched CBE programs, through conversations, site visits, and opportunities to “pick their brains.” Program leaders also highlighted the value of technical assistance with organizations like C-BEN and opportunities to gather as a community through conferences.

Institutions interested in implementing CBE may consider seeking opportunities to learn from the field by building relationships with experienced CBE practitioners, participating in national or regional CBE networks, and engaging in shared learning activities. These types of efforts can help institutions identify common challenges, expand their understanding of CBE models, and support more informed decision making and approaches during planning and early implementation.

Looking ahead, our work with these longstanding institutional partners will continue as part of AIR’s broader, multiyear evaluation of learner outcomes in postsecondary CBE programs. Building on the implementation insights documented here, subsequent phases of the study will integrate program level design information with enrollment and outcome data to support a rigorous assessment of CBE’s impact on learner progress and success. Through this work, we aim to provide a deeper understanding of CBE’s impact on learner success and how learner outcomes may be shaped by programs’ design choices and implementation experiences.

REFERENCES

- Cooper, T. R. (2016). Faculty supporting and developing a CBE program—strategies implemented at the University of Mary Hardin-Baylor. *The Journal of Competency-Based Education*, 1(1), 31–35.
- Navarre Cleary, M. (2020). Comparing goals to outcomes for graduates of a competency-based education program. *Journal of Competency-Based Education*, e01223.
- Parsons, K., Mayer, K. M., Hatcher, M., Young, A., & Caton, K. (2023). *Postsecondary competency-based education program model map: Research brief*. Washington, DC: American Institutes for Research.
- Rivers, C., Gibson, S., Contreras, E., Livingston, T., & Hanson, P. (2019). Competency-based education: An evolutionary higher education business model. *Journal of Competency-Based Education*, e1179.