



Shifting the Skills Conversation

Employer Attitudes on and Outcomes for
Career Technical Education

OCTOBER 2021



Introduction

“SKILLS MISMATCH.” “TALENT SHORTAGE.” “WAGE GAP.” While the precise nature and scope of these terms are open to debate, what is clear is that strengthening connections between employers and institutions of learning must be a priority. When employers and learners achieve a shared understanding of what skills are needed for the jobs of the future and how those skills are counted and valued in the hiring process, learners make more informed decisions about a path to success in the career of their choice, and Career Technical Education (CTE) programs are more responsive to industry needs.

CTE can be the bridge for policymakers and employers to build that common understanding by providing foundational and technical skills that prepare learners for careers and seamless on-ramps to lifelong learning. National surveys of secondary learners and their families conducted by Advance CTE in 2017 and 2021 demonstrated that CTE is a value-add for learners and families.¹

However, the full impact of CTE can only be reached only through robust and consistent participation by employers in the design, delivery and success of the hands-on instruction and work-based experiences that set CTE apart from other educational programs. Policy and practice must continue to break silos between systems of learning and work, raise awareness of the benefits of CTE, and both remove barriers to and incentivize participation by employers in high-quality CTE programs.

To aid CTE leaders in expanding employer support for and participation in CTE programs and advocacy, Advance CTE conducted a national survey of 315 employers from predominantly in-demand industries to determine the top skills desired by employers, their attitudes toward CTE, and their current involvement in CTE partnerships. The respondents were full-time company employees in the position of supervisor or higher across human resources, management and executive levels who were actively involved in hiring decisions.

Conducted in November 2020, the survey provides a valuable snapshot of the challenges and needs of businesses facing a long recovery from the COVID-19 (coronavirus) pandemic and directly affected by the ‘skills gap.’ Sixty-nine percent of businesses surveyed, the majority of which are connected to high-growth industries, reported experiencing a moderate or large negative impact from the pandemic.

¹ Advance CTE. (2021). Communicating Career Technical Education: Learner-centered messages for effective program recruitment. <https://careertech.org/resource/communicating-CTE-recruitment>



Findings

This research empowers CTE leaders and policymakers to better understand employer needs and capacity and make data-driven decisions to improve both program quality and employer engagement. When CTE systems are designed to consider the perspective and capacity of employers, learners will have greater access to experiences to explore and pursue the career of their choice without limits.

- 1** Employers **view CTE very positively** and see CTE as a **value-add**.
- 2** Employers **value skills over degrees**, and believe CTE will help **meet their skill-based hiring needs**.
- 3** Employers overwhelmingly want to **expand their partnerships with CTE programs**.
- 4** Employers strongly favor **increased public funding for CTE**.

FINDING 1:

Employers view CTE very positively and see CTE as a value-add.

Employers in in-demand industries are very aware of CTE, with 79 percent having heard of it. This awareness translates into almost universally favorable views – 96 percent of employers that had heard of CTE had a favorable view, and 63 percent held a very favorable view.

Employers that recruit from CTE recognize CTE programs as an innovative avenue to address changing industry challenges and workforce needs. Employers currently recruiting from CTE programs were more likely to report their industry as experiencing a “limited talent pool to meet soft skill/social skill needs,” and more likely to report a lack of racial, ethnic and socioeconomic diversity in their industry. These employers were also more likely than those not recruiting from CTE programs to report positive industry trends including providing ample opportunities for growth, adding new roles as a result of technology, and experiencing industry change that requires adaptable employees, as shown in **Figure 1**.

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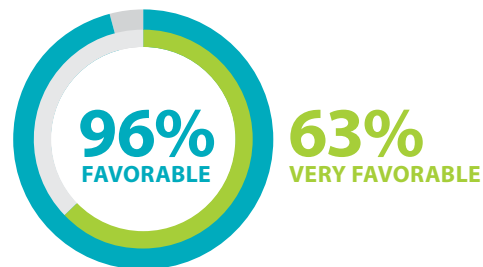
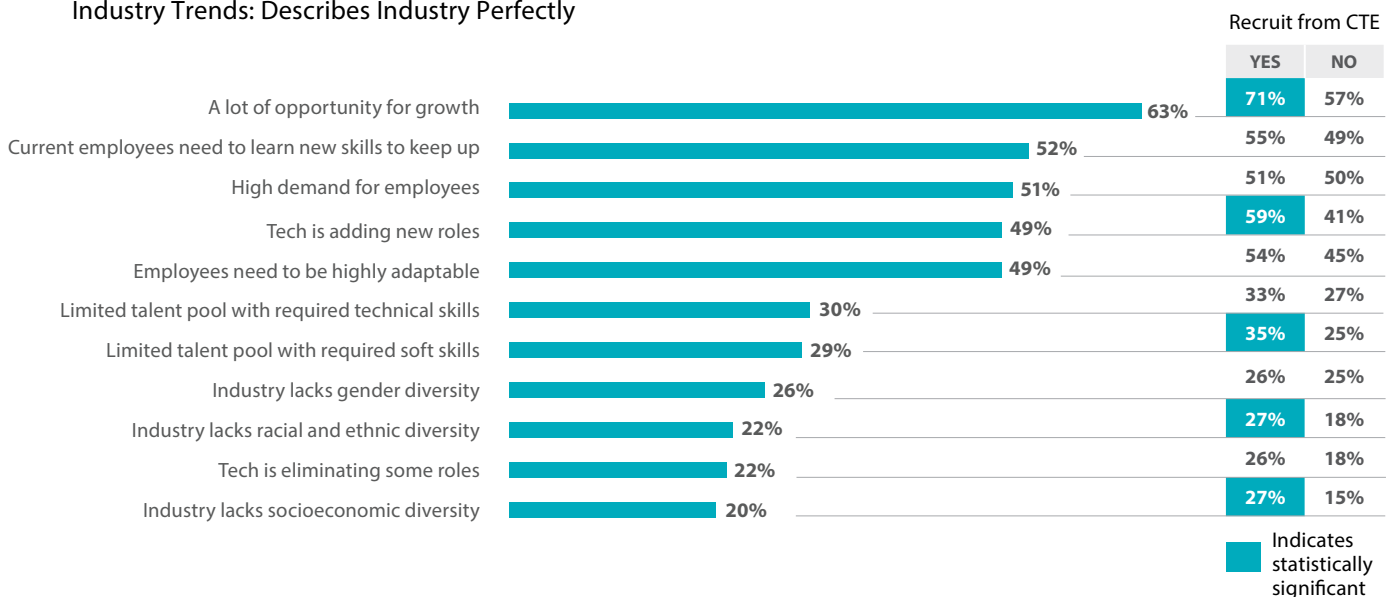


FIGURE 1.
Industry Trends: Describes Industry Perfectly



Employers also identified CTE as a valuable channel to meet hiring needs for in-demand industries. After learning more about CTE through a written description and video, 83 percent of all respondents were more likely to hire an applicant with CTE experience. Enthusiasm was even higher among employers from the healthcare and technology industries, with 94 percent and 91 percent of respondents respectively more likely to hire an applicant with CTE experience.

Employers' positive impressions of CTE extends to final hiring decisions. **Seventy-seven percent of employers reported hiring an employee in part because of their CTE experience.** This finding was even more prevalent among large employers, 87 percent of which had hired based on CTE experience.

Respondents identified multiple benefits from recruiting and hiring applicants with CTE experience. Employers not only were more likely to be matched with job-ready, skilled candidates, but also viewed these candidates as a net positive for business and industry growth. Employers that reported it as "easy" to find qualified job applicants were significantly more likely to have reported hiring a candidate based on CTE experience. Eighty-four percent of employers in this category had hired an applicant based on CTE experience compared to 67 percent of employers that found it "difficult" to find qualified applicants.

Eighty-three percent of respondents agree that hiring employees with CTE experience would improve their business's bottom line. This finding was even stronger among respondents employed by large businesses and respondents of color.

90 percent of employers of color agree that hiring employees with CTE experience would improve their business' bottom line.



State and local leaders should emphasize that CTE is a trusted source of talent that aligns with employer needs and provides agile responses to a variety of challenges facing employers in in-demand industries.

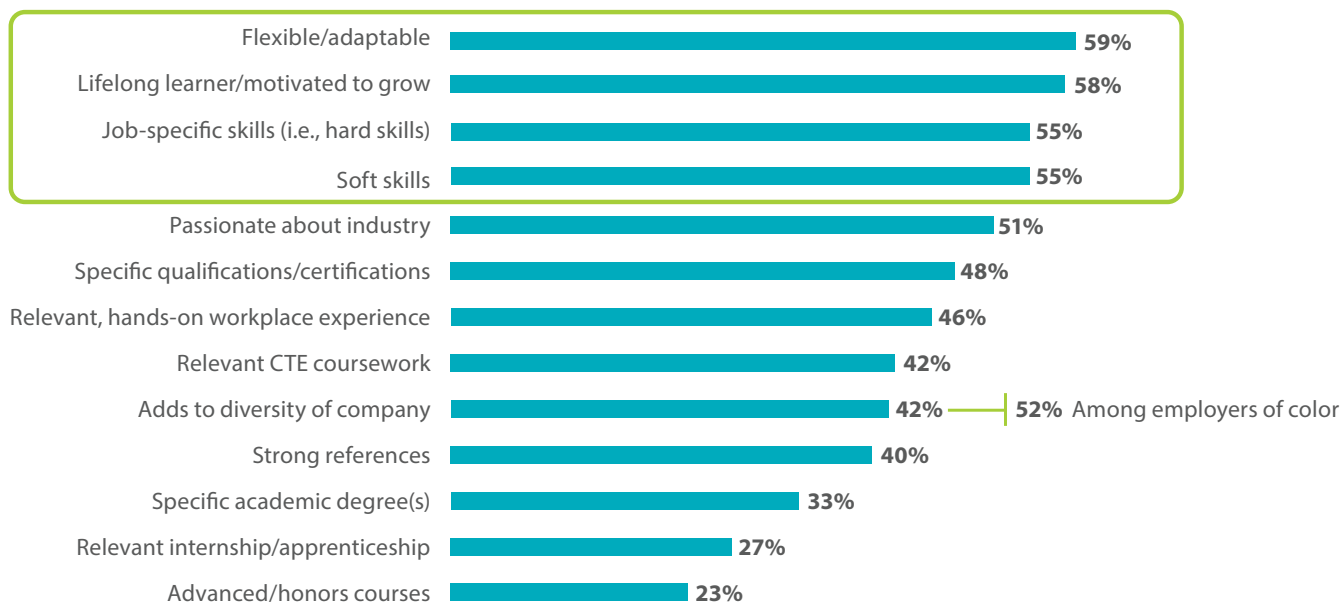


FINDING 2:

Employers value skills over degrees and believe CTE will help meet their skill-based hiring needs.

While existing hiring practices predominantly value degrees more than competencies, this research indicates that internal mindsets are shifting. When respondents were asked to rank the value of 13 qualifications considered when hiring a recent high school or college graduate, **Figure 2** illustrates that competencies including flexibility and adaptability, lifelong learner, and soft and hard job-specific skills were identified as “very important” by 55 percent or more of responding employers compared to more traditional qualifications, some of which may have more access barriers, including specific academic degrees (33 percent), strong references (40 percent), and advanced/honors courses (23 percent).

FIGURE 2.
Most important skills for recent job graduate candidates

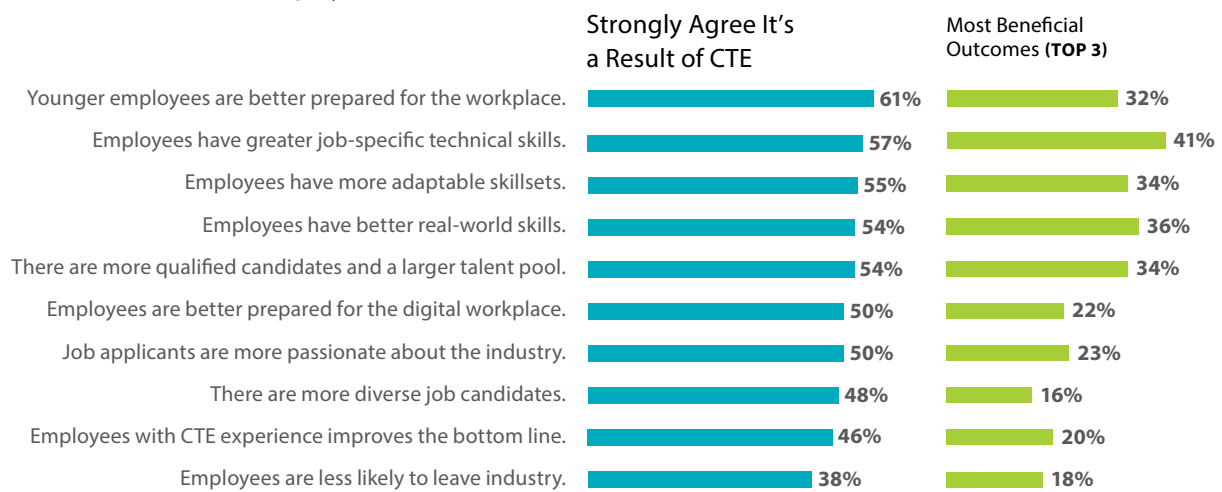


The findings reveal that among the strongest benefits of expanding CTE to employers is the potential to produce job-ready candidates that meet skill needs. When asked to choose the top three outcomes of CTE among ten options, employers identified strong job-specific technical skills, better real-world skills, more adaptable skill sets and a larger talent pool as their top choices.

As shown in **Figure 3**, CTE fulfills that potential. When asked for their level of agreement on how expanding CTE programs could impact their company and employees, more than half of employers strongly agreed that CTE produces a larger talent pool with employees that are more prepared for the workplace and possess adaptable technical and real-world skills.

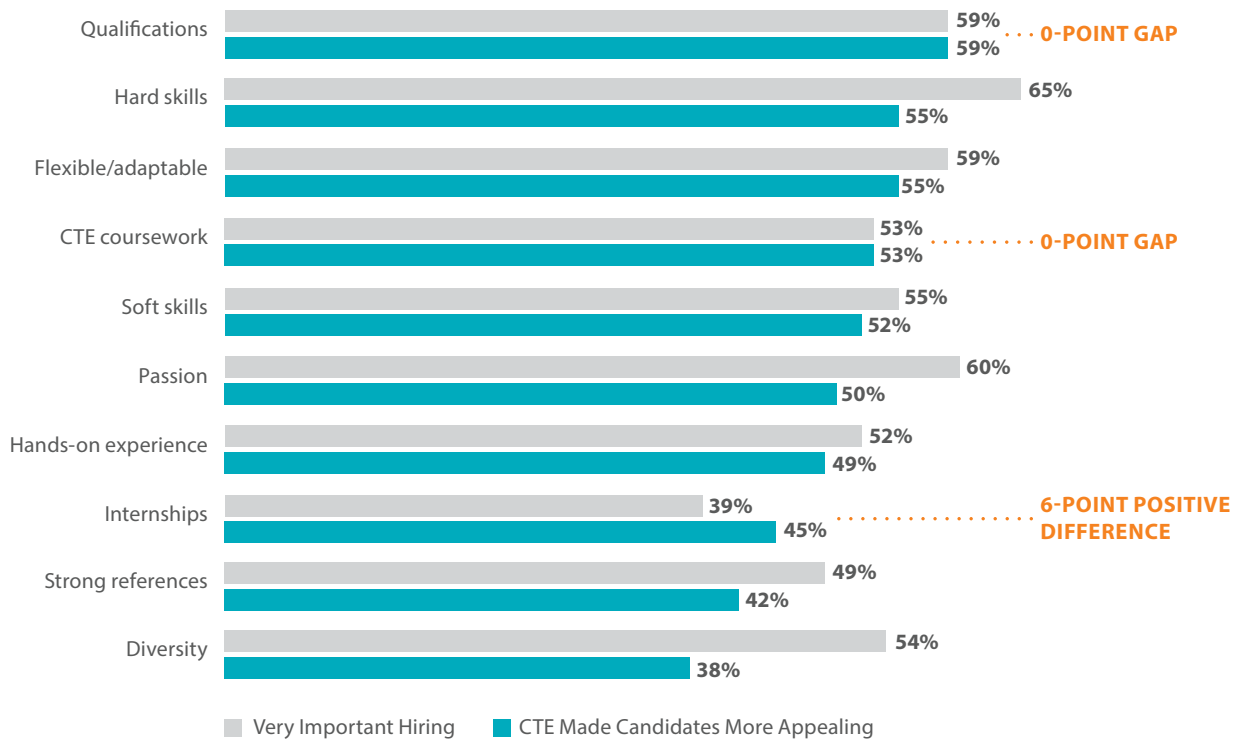
Employers see some room for improvement in CTE's contributions to diversity and employee retention — less than 20 percent of employers identified increasing candidate diversity and decreasing the likelihood of employees to leave the industry as a top three outcome of CTE programs.

FIGURE 3.
CTE's contributions to employer needs



Encouragingly, employers that had hired a candidate in part because of their CTE experience reported robust alignment between attributes that make applicants with CTE experience more appealing and qualifications that employers find most important in the hiring process. As shown in **Figure 4**, these attributes include flexibility and adaptability, soft skills, specific qualifications and CTE coursework.

FIGURE 4.
Importance of Skills & Impact of CTE (among those who hired because of CTE)



This finding strongly reinforces the value of CTE and highlights the importance of efforts by state CTE leaders to aid employers in matching graduates' experience with their skill needs by connecting employers and institutions of learning to design equitable practices that fully count, value and transfer each learner's skills.

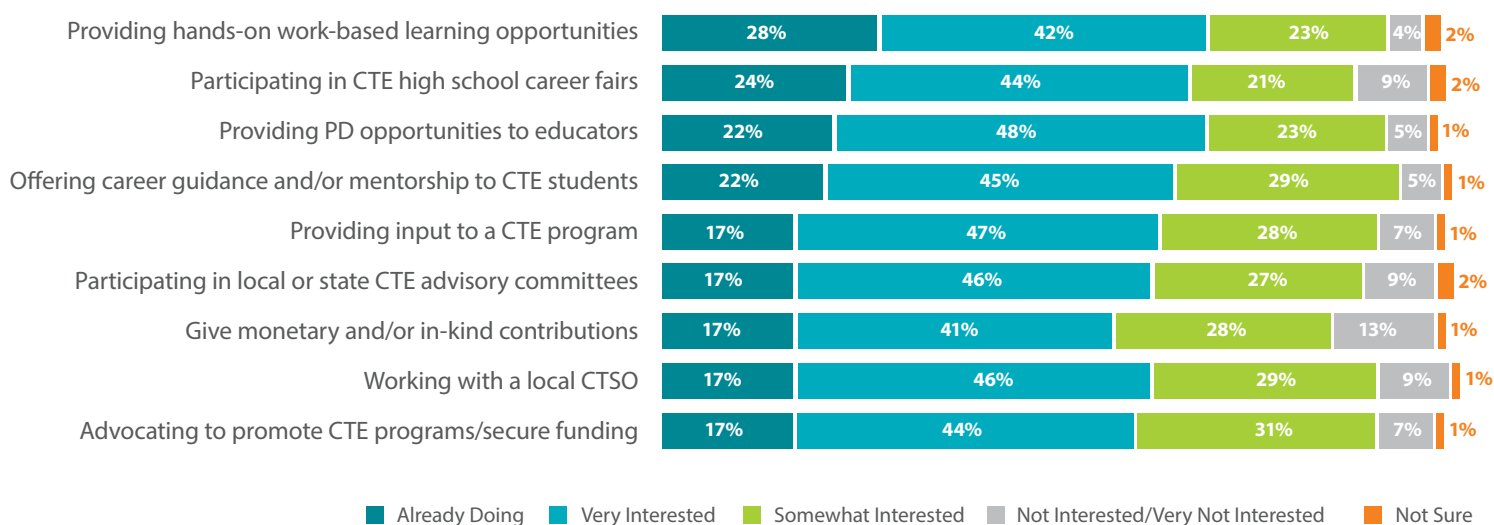
FINDING 3:

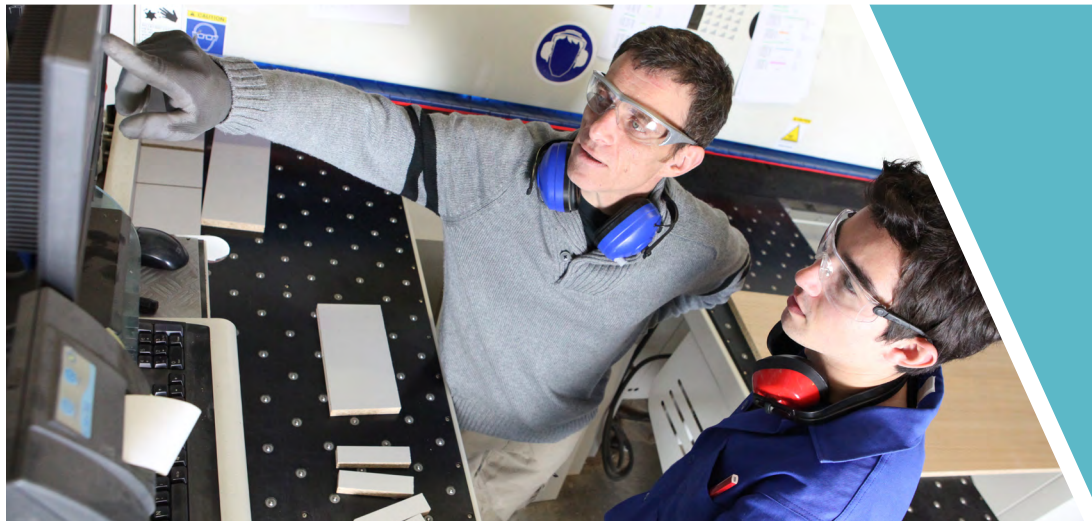
Employers overwhelmingly want to expand their partnerships with CTE programs.

As mentioned previously, active participation by employers in CTE programs is crucial to both learners and employers because it ensures skills-based education is fully responsive to changing industry needs. Meaningful employer involvement cannot be limited to occasional advisory committee meetings or other transactional experiences; it requires trust and consistent engagement across program design, delivery and evaluation. There is considerable room for growth in meaningful engagement — just a little more than 50 percent of employers reported actively recruiting entry-level candidates through CTE channels, including high school and college CTE programs and Career Technical Student Organizations (CTSOs).

Employers recognize that increased participation in CTE will deliver greater returns for their bottom line and talent pipeline. Almost every employer surveyed – those already involved with CTE and those that are not – are either already participating or interested in participating in at least one of the strategies listed in **Figure 5**.

FIGURE 5.
Interest in working with CTE





Employers not already involved in CTE indicated substantial interest in contributing to all nine strategies. In particular, about 75 percent of employers not already engaged in the following activities noted they were “very interested” or “somewhat interested” in four areas: providing input on CTE programs; offering mentorship to CTE learners; conducting advocacy to promote CTE programs and funding; and participating in CTSO events.

Respondents of color were more engaged in relationship-building activities than their White counterparts, with almost 80 percent “already doing” or “very interested” in opportunities to offer career guidance or mentorship to CTE students and professional development to CTE instructors compared to 61 and 67 percent respectively of White respondents. This finding is particularly encouraging to address the growing recognition among CTE leaders of the need to pursue intentional policies and partnerships for learners of color and other historically marginalized populations to see themselves in CTE instructors, leadership and related careers. Additionally, recent messaging research from Advance CTE revealed that Black and Latinx learners are not receiving equitable opportunities to access internships and connect with employers.²

Employers expressed robust support for strategies that can expand learner access to high-quality CTE experiences via virtual or hybrid delivery of work-based learning. **More than 70 percent of employers that were either already providing or interested in providing work-based learning were willing to offer these opportunities in an all-virtual or hybrid format.** Industry interest was highest among healthcare (92 percent) and manufacturing (85 percent) employers compared to 59 percent of accounting, banking and finance employers and just 51 percent of construction and architecture employers.

²Advance CTE. (2021).Communicating Career Technical Education: Learner-centered messages for effective program recruitment. <https://careertech.org/resource/communicating-cte-recruitment>

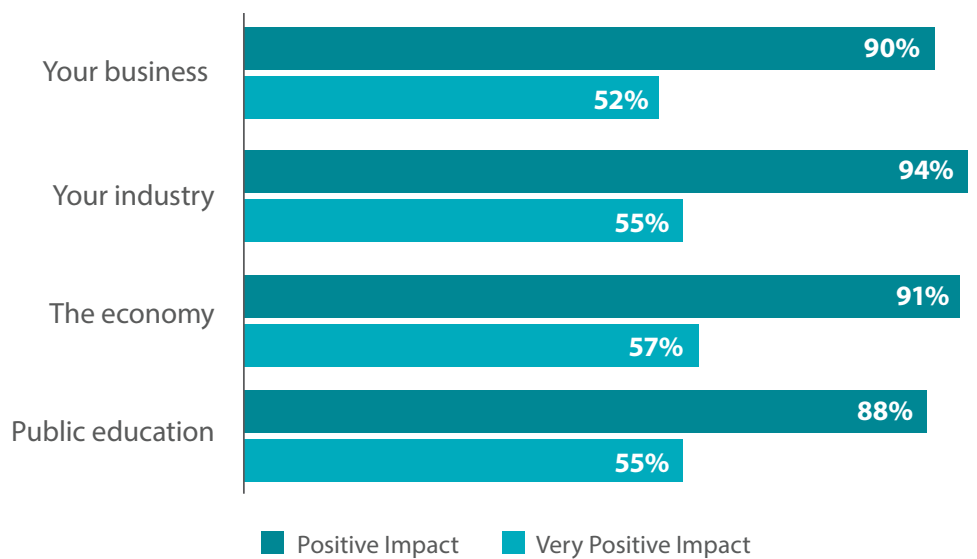
FINDING 4:

Businesses strongly favor increased public funding for CTE.

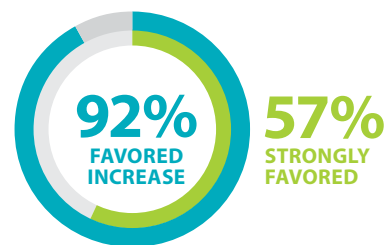
An impressive 92 percent of employers surveyed favored increased public funding for CTE, and 57 percent were strongly in favor. Employers of all sizes viewed increased funding for CTE as a direct benefit to their business and public education, as shown in **Figure 6**.

FIGURE 6.

Increased investment in secondary and postsecondary CTE would have a positive/very positive impact on:



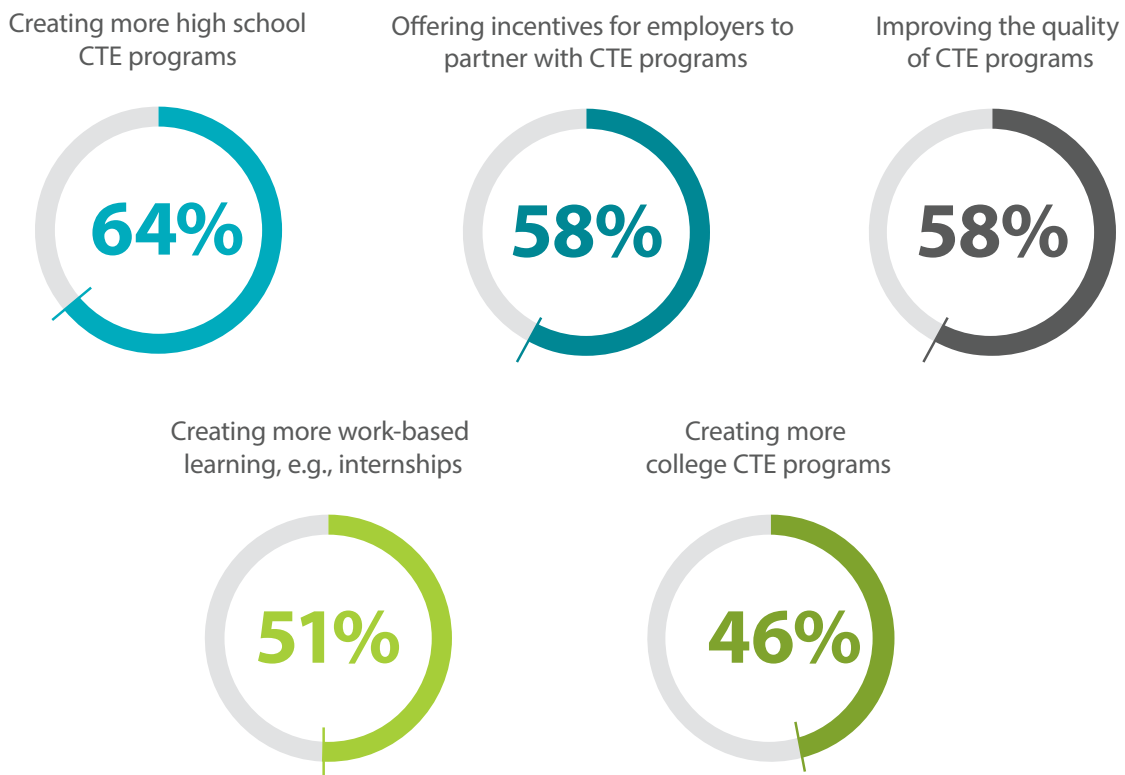
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Employers in favor of additional funding for CTE were most interested in **expanding high school CTE programs and funding incentivized employer engagement and program quality improvements**, with 64 and 58 percent of employers respectively choosing these options as shown in **Figure 7**. Those already familiar with CTE were more focused on funding program quality improvement, with 62 percent of employers that had heard of CTE choosing that funding priority compared to 42 percent that had not heard of CTE.

Interestingly, despite the recent focus on reskilling and upskilling workers most affected by the COVID-19 pandemic to respond to industry transformations, only 46 percent of employers selected postsecondary CTE programs as a funding priority. State and local CTE leaders should seek input from employers on top funding priorities to find areas of common ground and pursue collaborative advocacy.

FIGURE 7.
Percent of employer support for key areas of investment for additional CTE funding





Recommendations for State CTE Leaders

The findings provide state CTE leaders with several steps that they can take or consider to enhance employer participation, program quality and learner outcomes:

1. Leverage Partnerships to Advance Skills-Based Hiring

Employer preferences for skills over degrees in this research is a positive first step towards achieving learning and hiring processes in which each learner's skills are fully counted, valued and portable. Employers often do not know where to start to explore skills-based hiring, and CTE programs can be a critical connector. CTE leaders should leverage new or increased participation in CTE as opportunities to discuss skills-based hiring and conduct pilots through work-based learning experiences.

2. Expand Partnership Capacity Among Small Business and Local Systems

Employers want to create a local impact through CTE programs. When asked about preferences for learning more about opportunities to participate in CTE programs, local CTE programs were chosen as the top four out of 11 outreach options. State leaders can act as capacity builders by providing infrastructure and technical assistance to facilitate local partnerships between employers and education institutions, such as Hawaii's ClimbHI Bridge initiative.³

The findings indicate small businesses face capacity barriers to leveraging the full potential of CTE experiences. States should leverage existing partnerships with workforce agencies, small business support agencies, and chambers of commerce, particularly those supporting employers of color, to increase small business participation in CTE programs. Large businesses were 15 to 20 percentage points more likely than small businesses to choose "already doing" or "very interested in" eight of the nine suggested CTE partnership opportunities in this survey. Additionally, only 40 percent of small employers that are interested in or already providing hands-on, work-based learning opportunities expressed interest in providing hybrid work-based learning experiences compared to 50 percent of medium and 58 percent of large employers. Small employers were also less likely to recruit from CTE programs, with 67 percent of large employers recruiting from CTE programs compared to 43 percent of small employers.

³ Advance CTE. (2021). Strengthening Career Pathways Through the Power of State and Local Partnerships. <https://careertech.org/resource/strengthening-state-local-partnerships>

3. Provide Repeated and Consistent Messaging on the Value and Benefit of CTE for Employers

Repeated exposure to information about the value and benefits of CTE programs increases the level of employer enthusiasm for, participation in and interest in recruiting and hiring from CTE programs. Among employers that reported already hiring from CTE programs, favorable perceptions of CTE increased from 69 percent to 79 percent after viewing a video about CTE.

Employers with repeated exposure to CTE were more likely to view CTE programs as beneficial to their bottom line — 86 percent of employers that had heard of CTE viewed such programs as beneficial compared to 74 percent that were hearing about CTE for the first time. Ninety-three percent of employers already recruiting from CTE saw the programs as beneficial to their bottom line compared to 76 percent of employers not doing so.

Consistent state communications and marketing campaigns by state CTE leaders that directly target employers, include proven messages on what employers are looking for in potential employees, and incorporate data on outcomes provided through CTE programs can provide support to local systems that lack the capacity to do so and can lead to more employer partnerships.

4. Raise Awareness of the Value of Postsecondary CTE

Postsecondary CTE programs, particularly those that provide opportunities for reskilling and upskilling, are responsive avenues for employers to advance lifelong learning. However, employers were less enthusiastic about funding these programs compared to secondary CTE - when asked about priority areas for additional public funding of CTE, 64 percent of employers selected high school CTE programs compared to 46 percent for college CTE programs. Additionally, college CTE programs were ranked in the bottom half of avenues used for recruiting entry level job candidates- 43 percent of employers reported recruiting from college/university career fairs compared to 32 percent from CTE programs. This finding suggests employers may not be aware of the 3.5 million CTE learners currently served by postsecondary institutions.

On a positive note, local community college and university CTE programs were ranked on par with secondary CTE programs as a top local source that employers want to connect with to learn more about CTE-employer partnerships. States can take the lead in elevating high-quality, equitable postsecondary CTE programs and reinforce their value as a job-ready talent pool for recruitment for in-demand fields. Florida, for example, has conducted statewide marketing campaigns for postsecondary CTE programs as part of COVID-19 economic and learning recovery efforts.⁴

⁴ Florida Department of Education. (2020). *Get there FL – career and technical education (cte) is a modern approach to higher education and training*. Get There FL – Career and Technical Education (CTE) is a modern approach to higher education and training. <https://gettherefl.com/>

Conclusion

The findings from this research confirm that employer involvement in CTE programs results in “win-win” outcomes for both industry and learners. Employers not only recognize that learners with CTE experience benefit their business, industry and overall bottom line, but are also willing to provide the much-needed investments of input, social capital and advocacy to ensure that CTE programs remain responsive to industry needs. At the same time, this research reinforces that many employers, including those in in-demand industries, continue to face significant consequences from the COVID-19 pandemic and are looking for additional resources, including more funding for CTE programs, to incentivize and support connections between CTE programs and industry talent pipelines.

METHODOLOGY A national employer survey was conducted in November 2020 consisting of 315 employers. Respondents were confirmed to be involved in hiring decisions across multiple levels, including human resources, leadership, management and executive positions. Respondents were evenly distributed among small (1-99 employees), medium (100-999) and large (1000 or more employees) employers. Sixty-four percent of respondents identified as male and 36 percent as female; 12 percent of respondents identified their ethnicity as Latinx, and 21 percent identified as professionals of color. The mean and median age of respondents was 40 years old.

Seventy-five percent of employers surveyed were concentrated across five CTE-connected industries, with the remaining employers categorized as ‘Other’: accounting/banking/finance; construction and architecture; healthcare and pharmaceuticals; manufacturing; and technology, information technology and telecommunications. The six industries were chosen for being identified ‘in-demand industries’, defined by the Workforce Innovation and Opportunity Act as “an occupation that currently has or is projected to have a number of positions (including positions that lead to economic self-sufficiency and opportunities for advancement) in an industry sector so as to have a significant impact on the State, regional, or local economy.”

The survey was conducted using established, industry online panels that specialize in reaching employers. Quotas were set to ensure that the data was representative by region. Edge Research follows Insights Association/industry best practices. Data is self-reported.

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ABOUT ADVANCE CTE Advance CTE: State Leaders Connecting Learning to Work, first established in 1920, is the longest-standing national non-profit that represents State CTE Directors and state leaders responsible for secondary, postsecondary and adult CTE across all 50 states, the District of Columbia and U.S. territories. Advance CTE’s mission is to support state CTE leadership to advance high-quality and equitable CTE policies, programs and pathways that ensure career and college success for each learner. Learn more at careertech.org.