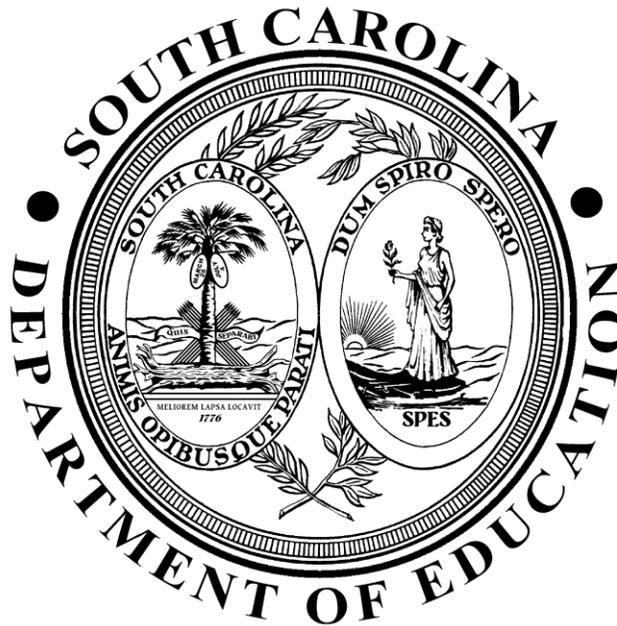


STATE OF SOUTH CAROLINA
DEPARTMENT OF EDUCATION

MOLLY M. SPEARMAN
STATE SUPERINTENDENT OF EDUCATION



**Education and Economic Development Act
Coordinating Council Report**

To: The Governor of South Carolina, Members of the South Carolina General Assembly, the South Carolina Department of Commerce, and the State Board of Education

Pursuant to Section 59-59-175

December 1, 2019

The South Carolina Department of Education does not discriminate on the basis of race, color, religion, national origin, sex, sexual orientation, veteran status, or disability in admission to, treatment in, or employment in its programs and activities. Inquiries regarding the nondiscrimination policies should be made to the Employee Relations Manager, 1429 Senate Street, Columbia, South Carolina 29201, 803-734-8781. For further information on federal non-discrimination regulations, including Title IX, contact the Assistant Secretary for Civil Rights at OCR.DC@ed.gov or call 1-800-421-3481.

Dear Governor McMaster, Members of the South Carolina General Assembly, and Members of the State Board of Education:

In 2018, during its first year as a reconstituted council under the South Carolina Education and Economic Development Act (EEDA), the EEDA's Coordinating Council organized itself into specialized subcommittees and identified a series of goals to further the Act's objectives. This year, the Council continued that work by prioritizing the goals of its subcommittees and working to integrate those goals into a coordinated plan of action. The Council's ultimate aim is to ensure that it fulfills its statutory mission of helping to ensure the effective implementation of the EEDA, while giving a voice to the many stakeholders (parents, students, teachers, and employers) who have a vital interest in the Act's success.

One of our goals for this year was to visit communities throughout South Carolina to learn how the objectives of the EEDA were being implemented in local contexts. In February, we went to Lexington Middle School, where we witnessed remarkable efforts by administrators and school counselors to make students the architects of their own Individual Graduation Plans. In May, we visited Trident Technical College in Charleston County, where members of the Charleston Regional Youth Apprenticeship Program described a vigorous collaboration between the college and the local business community that is boosting workforce development for young people in the area. In September, we welcomed officials from the Aiken County School District, Aiken Technical College, and USC-Aiken, to Columbia, who have partnered with the Workforce Development Board to create exciting occupational opportunities in cyber security.

What we have seen during this year has convinced us that, although the EEDA prescribes a range of uniform mandates to spur educational and workforce development throughout our state, those mandates are best implemented locally by students, parents, educators, and employers who are sensitive to local needs and opportunities. As a Coordinating Council, we will support these local efforts by identifying and publicizing "best practices," building effective implementation networks, and calling attention to promising local efforts that could benefit from increased resources.

We remain grateful to all of you for your support of the EEDA, and we look forward to continuing to work with you to increase educational and workforce development opportunities for all of the citizens of South Carolina.

Sincerely,



Stephen Cox
Chairman, EEDA Coordinating Council



Molly M. Spearman
State Superintendent of Education

Education and Economic Development Act Coordinating Council Members 2018–19

1. Stephen Cox, Chairman, Gubernatorial Business Appointee
2. The Honorable Molly M. Spearman, State Superintendent of Education
3. Michael McIrney, Secretary of Commerce Designee
4. Dan Ellzey, Director, South Carolina Department of Employment and Workforce
5. Dr. Tim Hardee, Executive Director for State Board for Technical and Comprehensive Education
6. Cynthia Bennett, Executive Director of the South Carolina Chamber of Commerce Designee
7. James Richter, Executive Director of the South Carolina Manufacturer's Alliance Designee
8. Rusty Monhollan, Executive Director of the South Carolina Commission on Higher Education
9. Georgia Mjarten, Executive Director of South Carolina First Steps to School Readiness
10. Dr. Harrison Goodwin, Superintendent, Chesterfield County Schools
11. John Murphy, Principal, North Augusta High School
12. Sherrie Beaver, South Carolina Department of Education Office of Student Intervention Services
13. Ashley Brown, RD Anderson Applied Technology Center
14. Hollie Harrell, Director of Anderson District 1 &2 Career Center
15. Dr. Robert Jones, Clemson University
16. Dr. Walt Tobin, President, Orangeburg- Calhoun Technical College
17. Neil Robinson, Chairman of Education Oversight Committee Designee
18. The Honorable Rita Allison, Speaker of the SC House of Representatives Designee
19. The Honorable Scott Talley, Senate President Pro Tempore Designee
20. Dr. Christine Crawford, Gubernatorial Business Appointee
21. Bryan Hamrick, Gubernatorial Business Appointee
22. Tim Hayden, Gubernatorial Business Appointee
23. Carl Henson, Gubernatorial Business Appointee
24. Srikanth Kodeboyina, Gubernatorial Business Appointee
25. Milton Smith, Gubernatorial Business Appointee
26. Don Herriott, Gubernatorial Business Appointee
27. Carol Moody, Gubernatorial Business Appointee
28. Janice Jolly, Gubernatorial Business Appointee

Executive Summary

The Coordinating Council is divided into four subcommittees, each of which has identified a range of objectives focused on a particular area of the EEDA. These four subcommittees are: (i) Articulation, Dual Enrollment, High School Graduation and Postsecondary Education; (ii) At-Risk Students, Comprehensive Guidance & Counseling and Individual Graduation Plans; (iii) Coordination of Efforts with Workforce Development Board, Regional Education Centers, Coordinating Council on Workforce Development and Sector Strategies; and (iv) Industry Credentials, Apprenticeships and Soft Skills.

In 2018, each of these subcommittees established a series of goals within their areas of specialization. This year, each of the subcommittees prioritized those goals and delivered a presentation to the full Coordinating Council to explain those priorities and a plan to fulfill them. At the end of the year, representatives of each of the subcommittees met to develop an integrated plan of action to guide the Council's work in 2020.

The Council's first subcommittee has adopted as its priority the further development of a comprehensive system of transfer and articulation agreements throughout the state. As the cost of post-secondary education continues to rise, it is critical that students throughout South Carolina be able to both take advantage of local educational opportunities *and* transfer to more distant campuses when feasible, without risking the loss of valuable educational credits. A robust network of articulation agreements ensures that students can pursue their educational development as efficiently and inexpensively as possible.

The Council's second subcommittee has adopted as its priority the removal of any impediments to the robust implementation of Individual Graduation Plan (IGP) protocols. The creation of the IGP requirement was one of the most powerful innovations of the EEDA, encouraging students to begin thinking about career development at the end of their eighth grade years. Local school districts have been faithful to the EEDA's IGP requirements, ensuring that all eighth graders and high schoolers revisit their IGP's every year. There is continued room for improvement both in giving students a greater role in the IGP process and in making it easier for parents to participate in IGP conferences. Our visit to Lexington Middle School has convinced us that a robust, student-led IGP protocol is the best way to ensure that students take ownership of their career paths and lay a firm foundation for future success.

The Council's third subcommittee is charged with ensuring that the Council's work is effectively integrated with that of other groups, throughout South Carolina, that are also pursuing workforce development goals. Much of this work has been invested in our state's "Sector Strategies" initiative, a public-private partnership that seeks to build a seamless "talent pipeline" in six occupational sectors that are critical to South Carolina's economic success. To make this "talent pipeline" even more powerful, the Council believes, it must be extended into our middle and secondary schools and "link up" with the career planning and development process that is the hallmark of the EEDA. The presentation that the Council received this year from educational and business officials in Aiken shows the remarkable success that can be achieved when public and private resources are joined in the pursuit of critical educational and workforce development needs.

The Council's fourth subcommittee has adopted as its priorities the expansion of apprenticeship programs in designated occupational sectors and the development of "soft skills" curricula. Our visit to Trident Technical College confirmed the impact that a vigorous apprenticeship program can have on boosting workforce development, particularly in communities with enthusiastic industrial partners. The importance of "soft skills," such as working well with others, getting to work prepared and on time, and completing tasks reliably and independently, is continually emphasized by our state's business community as one of their most important goals in securing a capable workforce.

In pursuing the EEDA's objectives, the Council is committed to ensuring that all of its efforts, as well as the efforts of other groups working to implement the EEDA's mandates, are characterized by two fundamental indicia of success. First, those efforts must be *measurable*. If the Council is to achieve its goal of identifying the "best practices" for achieving the EEDA's statutory aims, it must be able to rely on detailed, accurate data that measures the performance of particular initiatives. It is equally important that that data be shared, to the extent possible, while respecting confidentiality concerns across the public and private groups that are working together to fulfill the EEDA's promise. Without such comprehensive and readily available data, the Council can rely only on anecdotal and unverifiable characterizations of performance. Those measures are of little use in determining the success of our efforts and holding ourselves accountable to the EEDA's stakeholders.

The second characteristic that the Council demands of its efforts is that they be *equitable*. The citizens of South Carolina face disparate opportunities and resources as they pursue their educational and occupational development. Some live in wealthy urban and suburban communities with sophisticated educational facilities, ample public and private resources, and a range of enthusiastic business and industrial partners. Others, particularly in some of the more rural and remote parts of our state, live in areas where resources and opportunities are few. If the EEDA is to be a help to all those in South Carolina who need it, we must ensure that it works for everyone. That means, for example, creating incentives for regional collaboration and the pooling of resources. It also means continuing to work to eliminate the logistical and other impediments that prevent our citizens from taking advantage of available resources.

A summary of the Coordinating Council's 2019 meetings is set forth below. At the conclusion of that summary, we have included in this report a list of "Recommendations" and a "Plan of Action" for 2020. We look forward to continuing our work next year to offer *measurable* and *equitable* opportunities under the EEDA for all of South Carolina's citizens.

The council is divided into four subcommittees to target the work being done in each area. Below is a list of meeting dates the subcommittees each met.

A. Articulation, Dual Enrollment, High School Graduation, and Postsecondary Alignment Subcommittee

1. January 14, 2019
2. February 25, 2019
3. March 25, 2019

4. April 22, 2019
5. June 3, 2019
6. July 15, 2019
7. August 19, 2019
8. September 16, 2019
9. October 28, 2019

B. At-Risk Students, Comprehensive Guidance, and Individualized Graduation Plans Subcommittee

1. December 4, 2018
2. February 11, 2019
3. February 19, 2019

C. Coordination of Efforts with Workforce Development Board, Regional Education Centers, Coordinating Council on Workforce Development, and Sector Strategies Subcommittee

1. April 16, 2019
2. July 25, 2019
3. October 22, 2019

D. Industry Credentials, Apprenticeships and Soft Skills Subcommittee

1. March 26, 2019
2. May 21, 2019
3. September 12, 2019

The full EEDA Coordinating Council had four meetings. The Council decided it would be beneficial for its members to see what work the Council does out in the “field.” The subcommittees each planned a meeting that specialized in the areas of work they focused on. The following is a breakdown of the meetings.

A. October 25, 2018, Department of Employment Workforce

The Articulation, Dual Enrollment, High School Graduation, and Post-Secondary Alignment Subcommittee led the meeting. They provided a review of opportunities to enhance and expand dual credit and dual enrollment for high school students across the state in addition to goals of the subcommittee. However, rigor and quality must be ensured. An example of a successful partnership was Rock Hills Schools and York Technical College. This type of partnership allows students to participate in courses at an earlier age, offers more opportunities within career areas, and offers more opportunities for rural schools to expand agreements with their local technical college. Regional career centers were another example that was discussed. By regionalizing these centers, this allows more courses and opportunities to be provided to students rather than each individual district trying to obtain career programs it cannot support.

The second goal discussed was assessing the status of the SC-TRAC and SC-CAP. The main point discussed was that institutions needed to bind themselves to accepting credits for what they actually are, instead of counting them as general elective credits.

The third goal discussed was the need to define remediation and have a better understanding of how it is identified. The members pointed out that consideration needed

to be given to the manner in which a student is being remediated, and whether or not multiple measures are being used.

Lastly, the Commission on Higher Education (CHE) staff gave a presentation on a newly created website called “GetSmartSC” located at <https://getsmartsc.com/>. This website provides an overview for parents, students, and adults in helping them choose their path, whether it be college, a technical school, entering the military, as well as providing a list of career options, programs, certifications, and information on financial assistance.

B. February 19, 2019, Lexington Middle School

The At-Risk Students, Comprehensive Guidance, and Individualized Graduation Plans (IGP) Subcommittee in conjunction with Lexington Middle School in Lexington School District One met to learn more about the IGP process. The meeting began with the subcommittee and the school counselors at Lexington Middle School who gave an overview of the IGP process which included: (i) the basic IGP requirements under the EEDA; (ii) our state’s progress toward fulfilling these requirements; and (iii) a description of the impediments that remain in the IGP process. This gave the committee a lens into how the requirements are applied to the day to day activities in schools throughout the state.

The committee members then split into two groups. The first group observed live IGP conferences with students, parents, and their school counselors. Of particular note, Lexington Middle School provides that students lead their IGP meetings with their parents as opposed to school counselors. This gives students more ownership in the process and accounts for a 94 percent participation in face-to-face meetings. Group two participated in a roundtable discussion with parents, students, teachers, and school counselors to discuss their own experiences with the IGP process. The committee then came together as a whole to discuss observations and next steps with the parents, students, and counselors.

The self-directed IGPs by the students allows them to choose an interest they have rather than their parents choosing one for them. They choose a career cluster of interest and then discuss plans after high school. A list of graduation credits are shared, along with a list of credits for 4 year institutions. Students are also able to choose electives they find interesting. In addition, this process also allows parents to participate via phone call or Skype. The following is feedback from the panel discussion:

1. Student Feedback

The students on the panel commented that the student led IGP process allowed them to come up with a structure and a plan. They felt that the process was very efficient and organized and took the pressure off of them when deciding their goals. Most of all the process gives students a voice for what they want to do with their future.

2. Parent Feedback

The parents on the panel reported that it was exciting to hear what their child was interested in, and that the process really gave their child a voice. It provides their

student with a path and structure. Most importantly, it gives their children ownership of what they want to accomplish.

C. May, 22, 2019, Trident Technical College

The Industry Credentials, Apprenticeships and Soft Skills Subcommittee worked with Trident Technical College (TCC) to present to the committee the work that the Charleston Regional Youth Apprenticeships Program is doing in the Charleston area school districts. The Regional Youth Apprenticeship Program is a public/private partnership that involves a specially created Office of Apprenticeship at Trident Technical College, directed by Melissa Stowasser, who works with school and community initiatives, and creates sector partnerships by inviting companies to work together with their competitors. The members that make up this group include: Trident Region Employers- the employers that drive the program; Apprenticeship Carolina- who work with the employers all the way through the process; the school districts- Charleston, Berkeley, Dorchester 2, Dorchester 4, and the surrounding charters, private, and home schools; Charleston Metro Chamber- provides scholarships for students and pays for tuition and resources; the Daniel Island Rotary- provides \$30k in funding; and finally, Trident Technical College who serves as the intermediary for the group and provides dual enrollment classes.

The Youth Apprenticeship Model (YA) is based on job related education, on the job training, and a saleable wage. It also allows for students to register with the US Department of Labor, and earn a national credential, diploma, two years paid work experience, a journeyman credential, and a certificate from TCC. The YA industry sectors include: HVAC, Manufacturing, Automotive Services, Engineering Services, Information Technology, Hospitality and Culinary Arts, Law Enforcement, Business, and Health. The 2019–20 occupations include: Industrial Mechanic, Machinist, HVAC Technician, Automotive Mechanic, Welding, Civil CAD Technician, Engineering Assistant, Computer Programming, Computer Networking, Cyber Security, IT Governance, Accounting (Bookkeeper), Culinary Arts, Hotel Operations, Security to Pre-Law Enforcement, C.N.A to Pre-Nursing, Emergency Medical Technician, and Medical Office Assistant.

The Youth Apprenticeship Program has seen exponential growth since its inception in 2014. In the 2014–15 school year, there was one career pathway, six companies and thirteen youth apprentices. In the current school year, 2019–20, there are eighteen pathways with nine industry sectors, 160+ registered companies, and 146 applicants.

The recommendations to the committee from this group were:

1. Create a marketing campaign for parents, students, school based counselors, and employers as to how this program would be a return on investment;
2. Provide for mentor training and employer support; and
3. Provide transportation for students.

D. September 18, 2019, Department of Employment and Workforce

The Coordination of Efforts with Workforce Development Board, Regional Education Centers, Coordinating Council on Workforce Development, and Sector Strategies

Subcommittee hosted the fourth committee meeting by coordinating a panel discussion on cyber security. The panel consisted of four members: Dr. Tom Clark, Executive Director of the Fort Gordon Alliance; Dr. Forest E. Mahan, President of Aiken Technical College, Dr. Darren Timmons, Provost and Executive Vice Chancellor for Academic Affairs, University of South Carolina-Aiken, and Kenneth Lott, CTE Director, Aiken County School District.

Aiken County is somewhat of an anomaly in that it has a single county school district, a technical college that serves that county, and an institution of higher education all within the county. This sets their K–12 students up for success. Working with these partners, the cyber security division at Fort Gordon is able to offer Aiken students dual credit at Aiken Technical College and set them up for a highly skilled, highly paid, and high demand job with an Associate Degree of Applied Science Training or Applied Science Networking. Combined, these two programs have about 130 students. In addition, USC-Aiken has developed an Advanced Manufacturing Lab on their campus. Through this, around 60 students participate in dual enrollment and when they graduate high school, they have roughly 60 hours of credit.

Each partner reported how this group was able to collaborate on marketing to spread the word about this initiative. This ranged from fliers sent home to parents, job and career fairs, attending school sporting events to speak to students, and youth forums throughout the community. All agreed that their futures are shared and it is important for them to work together.

Recommendations

The Coordinating Council recommends that the following actions be taken to enhance the effectiveness of the EEDA:

1. Allow “virtual attendance” at annual IGP conferences.

The EEDA requires schools to schedule annual conferences with all students and their parents starting in each student’s sixth grade year and continuing through high school, “to assist in making career choices and creating individual graduation plans.” S.C. Code Ann. § 59-59-160. These annual conferences represent one of the most powerful tools offered by the EEDA to help young people and their parents make thoughtful plans for a student’s educational and occupational development. However, many parents who are deeply interested in attending these conferences cannot do so because of competing work and other commitments. Although some schools have sought to overcome this problem by scheduling evening and weekend meeting sessions, those hours put even more burdens on a school’s counseling staff.

The Coordinating Council believes that the best way to ensure attendance at IGP meetings for parents who face logistical hurdles is to allow attendance by Skype, Zoom, or other virtual means. Recent technological advances have made such “virtual meetings” almost as effective as in-person meetings, and allowing virtual attendance would relieve significant

burdens on families and school counseling staff. Because § 59-59-160 seems to anticipate in-person attendance, we believe the statute should be amended specifically to permit virtual attendance.

2. *Create an effective data collection and sharing network to better measure educational and workforce development goals.*

As noted above, the development of effective strategies for the attainment of the EEDA's goals depends, in large measure, on the availability of reliable data that can be used to measure educational and workforce development outcomes. Without such data, the performance of whatever strategies the Council and its partners may devise is left up to unverifiable anecdotes. To give just a few examples, it is important for the Council and its partners to be able to determine whether particular articulation arrangements, apprenticeship networks, and credentialing programs are effective, and in which parts of the state they are most effective. Measuring the success of such outcomes, accurately and verifiably, will enable us to identify "best practices" and promote them throughout South Carolina.

Last year, the South Carolina House passed H. 3757, which provides for the sharing of education and workforce data among state agencies in an effort to boost the effectiveness of workforce development strategies. The bill is currently in committee in the Senate. H. 3757 calls for the establishment of a comprehensive data network that will enable the Coordinating Council and other state groups engaged in similar efforts to measure the success of their work. The Council respects the confidentiality and privacy concerns that some have raised concerning such a network; to address those concerns, we believe, the bill includes a number of data security safeguards. Ultimately, it is essential that the Council and its partners have some level of meaningful data available to them to establish benchmarks and measure performance outcomes. The Council urges the General Assembly to continue to study H. 3757 and to pass the bill (or similar legislation) with appropriate data privacy protections.

3. *Support the establishment of regional career and technology centers in underserved areas.*

No child in South Carolina should have their future pre-empted by an accident of geography. Sadly, however, that is just what happens for many of our young people, who are born and grow up in remote areas of the State that lack access to significant educational resources and business opportunities. If we are to overcome this lack of equity, the Council believes, we must focus our efforts on creating regional centers of opportunity where students can get the education and business connections that they need for effective career development. Some school districts in our state have already taken up this challenge by building innovative, cutting-edge Career and Technology Centers that bring students, instructors, and employers together in powerful partnerships. A great example of this is The Continuum in Lake City that serves all five Florence School Districts and partners with Florence-Darlington Technical College and Francis Marion University, but there remains much work to be done. The Council encourages the General Assembly and the State Board of Education to continue to develop strategies for the effective regional consolidation and pooling of resources to reach as many of our young people as possible, especially in areas of our state that are traditionally underserved.

Plan of Action for 2020

In the coming year, the EEDA Coordinating Council will continue its focus on the specialized goals that have been prioritized by the Council's subcommittees. In particular, we will work to align ourselves more closely with the state's "Sector Strategies" initiative focusing on those occupational sectors deemed critical by the initiative and working to support the partnerships that the initiative has created. We will also continue to visit communities throughout the state that have been especially effective in promoting the goals of the EEDA. Our paramount goal is to ensure that all of the many groups, public and private, working to advance education and workforce development in South Carolina are acting in concert, so that that EEDA benefits fully from the synergistic energy of the Coordinating Council and its partners.

Education and Economic Development Act Coordinating Council
October 25, 2018
Lem Harper Building
Department of Employment and Workforce
631 Hampton Street, Columbia, S.C. 29201
1:00pm

- I. Adoption of Minutes from 5/17/18 Meeting
- II. Preliminary Discussion of Report due to Legislature 12/1/18
- III. Subcommittee Reports
 - Articulation, Dual Enrollment, High School Graduation & Postsecondary Education & Alignment Committee
 1. SC-TRAC
 2. Course Alignment Project
 3. Remediation Concerns
 - At-Risk Students, Comprehensive Guidance & Counseling and Individual Graduation Plans Committee
 - Coordination of Efforts with Workforce Development Board, Regional Education Centers, Coordinating Council on Workforce Development (CCWD), and Sector Strategies Committee
 - Industry Credentials, Apprenticeships and Soft Skills Committee
- IV. Other Discussion
- V. Adjourn

Summary of Dual Enrollment Policies, Data, and Findings





Earning College Credit in High School

- **Advanced Placement (AP):** score of 3 or higher on the AP exam
- **International Baccalaureate (IB):** score of 4 or higher on any higher-level IB course examination
- **Dual Enrollment:** a high school student takes college courses, and receives *both* high school credit and college credit (also often referred to as dual credit)

Commission Academic Policies:

- Advanced Placement and International Baccalaureate Credit Awards:
http://www.che.sc.gov/CHE_Docs/academicaffairs/apib_policy_May2016.pdf
- Dual Enrollment http://www.che.sc.gov/CHE_Docs/AcademicAffairs/DualEnrollment.pdf



Commission Definition of Dual Enrollment

“Dual Enrollment” refers exclusively to sections of courses offered through an institution of higher education in a cooperative arrangement with a local school district (i.e., Local Education Agency or LEA).

The purpose of these courses is to allow high school students who have mastered or nearly mastered the relevant high school curriculum and who are capable of college-level work that is, by definition, more advanced than the regular high school curriculum to earn simultaneously both high school credit toward graduation from high school and academic course credit toward either an associate or baccalaureate degree in an institution of higher education.

Commission Policy for Dual Enrollment:

http://www.che.sc.gov/CHE_Docs/AcademicAffairs/DualEnrollment.pdf





Commission Policy on Dual Enrollment Student Eligibility

- **Mastery:** Courses are intended for high school students who have mastered or nearly mastered the relevant high school curriculum and who are capable of college-level work.
- **GPA:** For courses offered by four-year institutions and two-year regional campuses of USC - a 3.0 grade point average (on a 4.0 scale).
- **Technical College Courses:** A high school student must meet the same requirements for individual courses as other technical college students.
- **Grade Level:** Limited to junior and senior students
N.B. Documented exceptions may be made for freshman or sophomore students.





Commission Policy on Dual Enrollment Continued Structure and Administration

- **Rigor:** Course materials and delivery must be comparable to standard post-secondary content and delivery.

- **Quality Assurance:** The institution's chief academic officer (or designee):
 - Approves courses;
 - Recruits and evaluates all dual enrollment faculty;
 - Ensures equality of student and faculty evaluation standards; and
 - Evaluates student performance to ensure successful course continuance.





Commission Policy on Dual Enrollment Continued Location

- Courses may be offered on the high school or college campus.
 - For dual enrollment courses offered at the high school, students must be enrolled for college credit (i.e., students in a single class cannot have the option to receive either high school or college credit).





Commission Policy on Dual Enrollment Continued Faculty Credentials

Per the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC™)

Faculty qualifications for both instructing four-year general education courses and associate degree courses designed for transfer:

- **Doctorate or master's degree** in the teaching discipline or master's degree with a concentration in the teaching discipline (a minimum of 18 graduate semester hours in the teaching discipline).

For associate degree courses not designed for transfer:

- **Bachelor's degree** in the teaching discipline or **associate's degree** and demonstrated competencies in the teaching discipline.





Commission Policy on Dual Enrollment Continued Transferability

Coursework Transferability

- Credit earned by dual enrollment will transfer to other public institutions in South Carolina provided the following:
 - **General education coursework:** dual enrollment courses have been selected from the list provided in the Statewide Articulation Agreement.
 - **Technical education courses:** the student enrolls in a technical college after high school which allows for such a course to be counted toward an associate degree, diploma, or certificate.
- It is the student's responsibility to contact and receive written assurance from any nonpublic institution in SC or any public or private institution outside SC of that institution's willingness to accept a dual enrollment course.

See: http://www.che.sc.gov/CHE_Docs/AcademicAffairs/TRANSFER/transferable_courses.pdf



Dual Enrollment Courses Offered

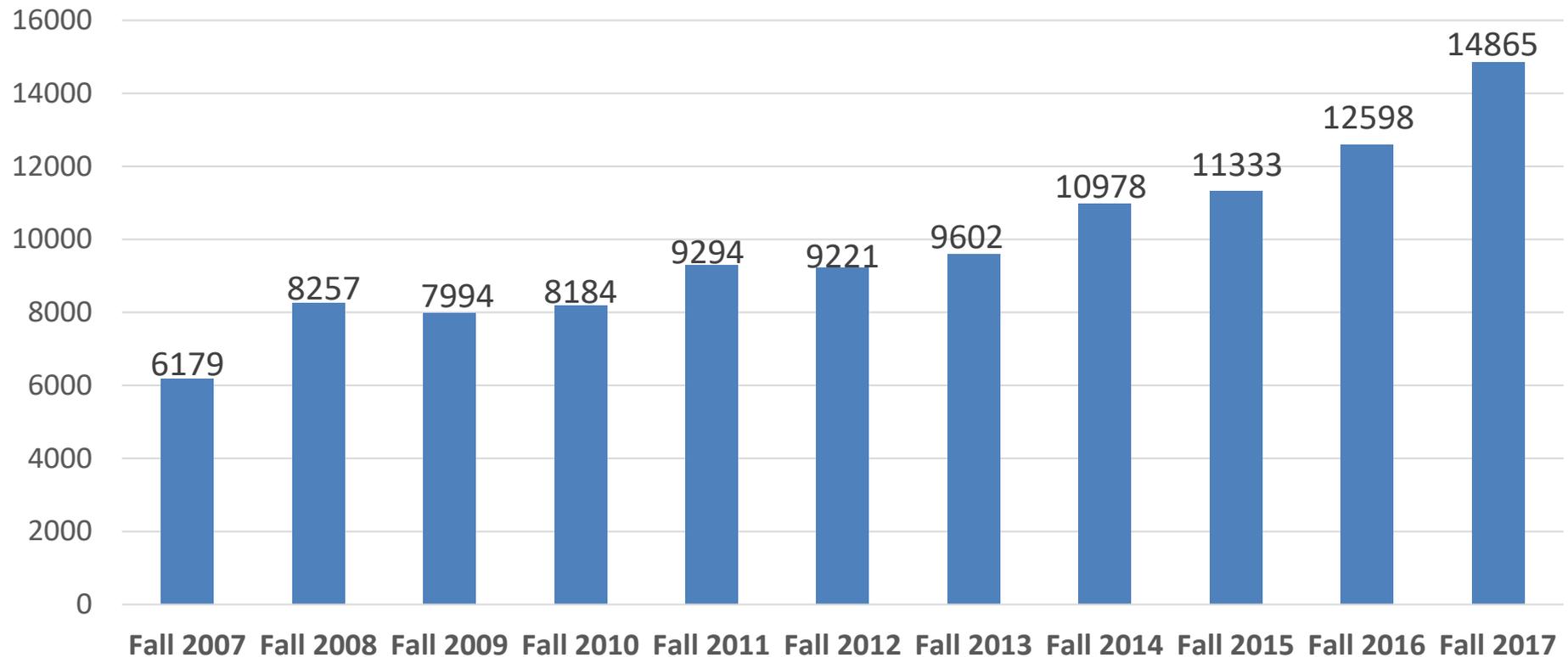
- Four-year institutions primarily offer **Teacher Cadet** courses, though some offer a limited number of general education courses (English, math, science, etc.)
- Two-year regional campuses of USC offer **general education** courses
- The majority of dual enrollment coursework is offered by the technical colleges and includes both **general education** and **technical courses**

N.B. Teacher Cadet courses are designed to encourage academically talented, high-achieving, high school students to consider teaching as a career and are funded on a per-student basis through the Center for Educator Recruitment, Retention and Advancement (CERRA). See: <http://teachercadets.com/>





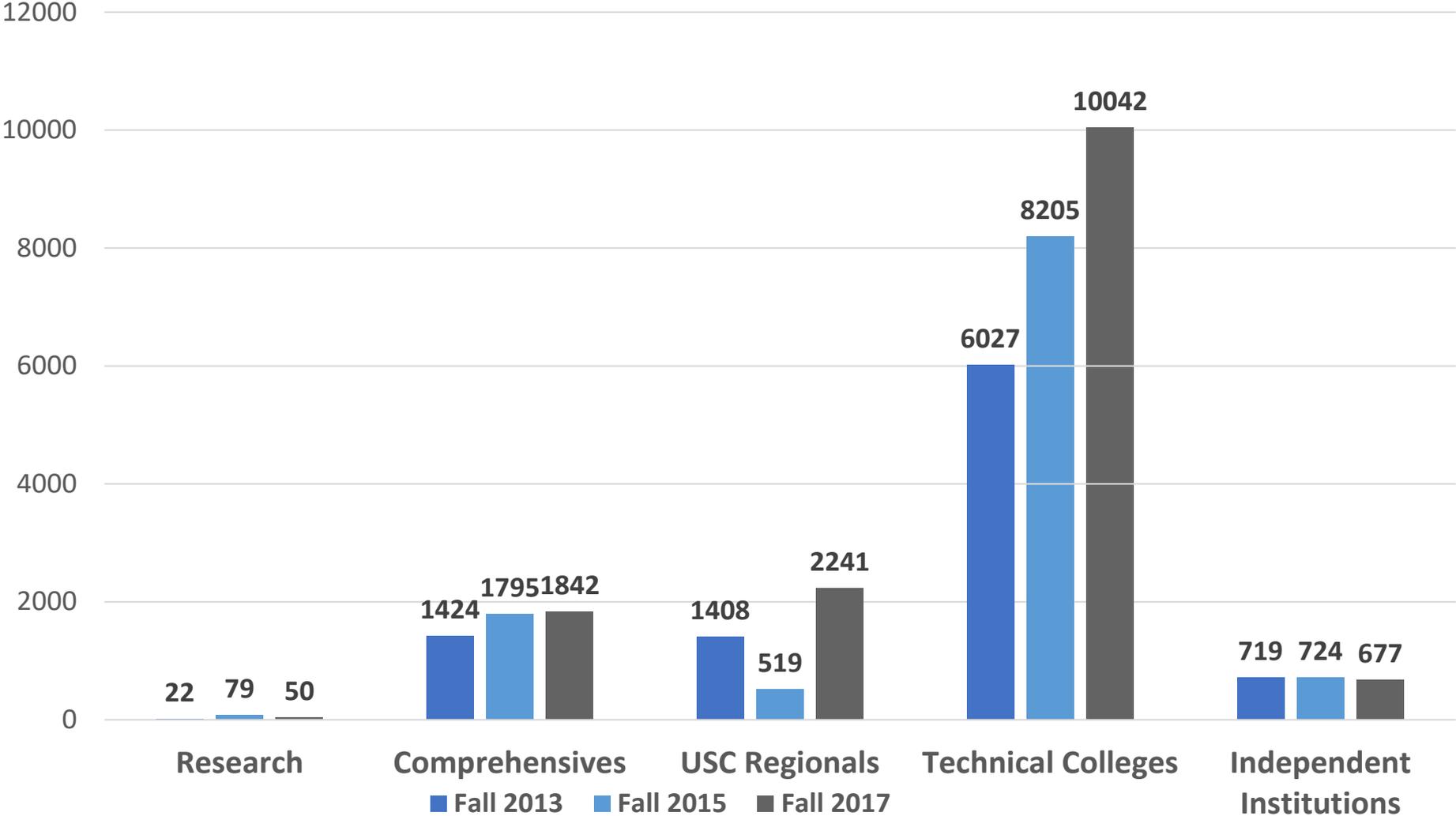
Number of High School Students Taking College Courses



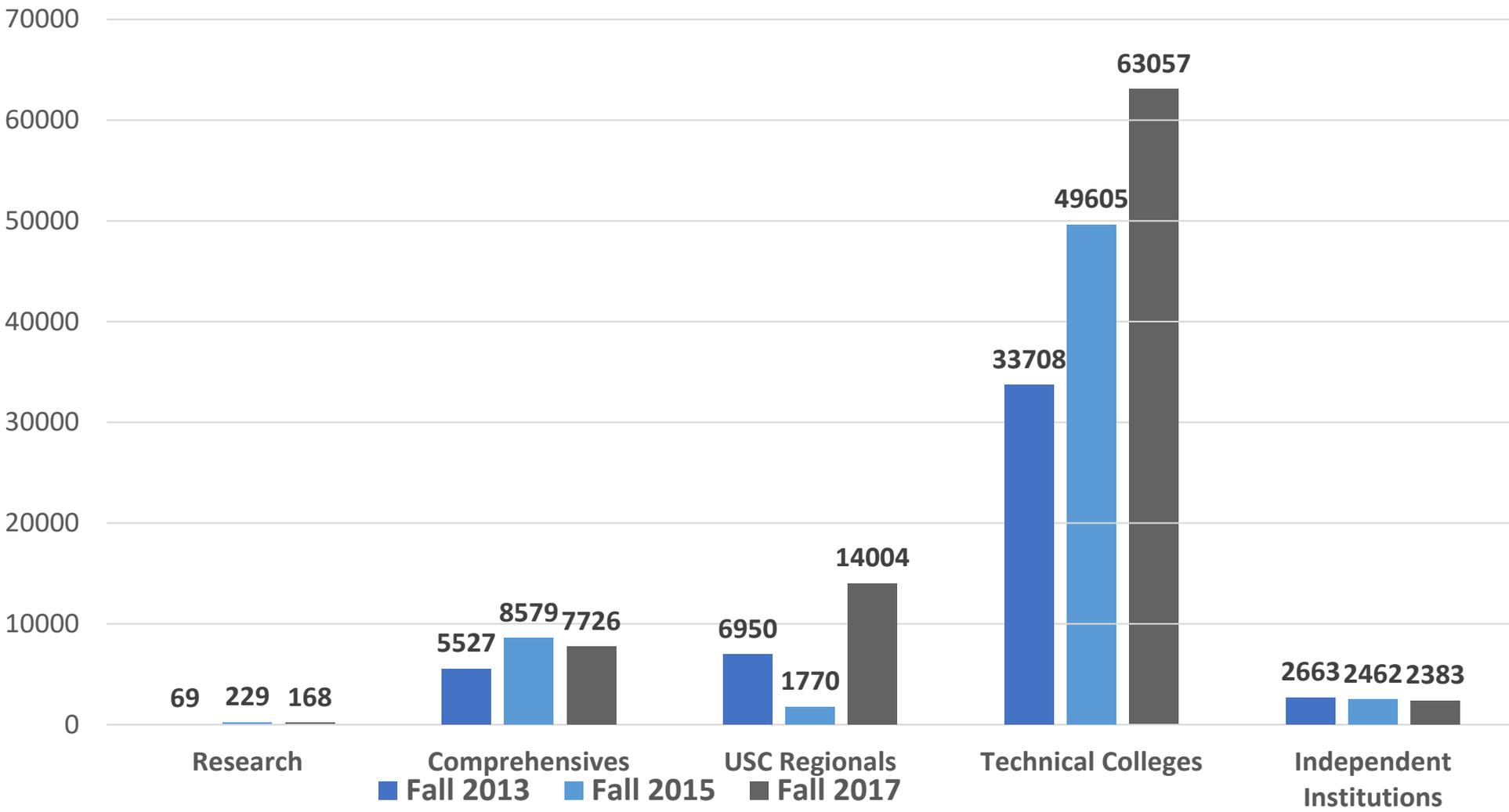
The number of high school students taking college courses increased 141% from Fall 2007 to Fall 2017.



Dual Enrollment Headcount



Dual Enrollment Credit Hours Attempted



Top Ten Course Prefixes Among Dually Enrolled Students

#	2014-15		2017-18	
	Prefix	Name	Prefix	Name
1	ENG	English	ENG	English
2	MAT	Math	MAT	Math
3	PSY	Psychology	PSY	Psychology
4	HIS	History	HIS	History
5	AHS	Allied Health Science	SOC	Sociology
6	CPT	Computer Technology	CPT	Computer Technology
7	SPC	Speech	SPA	Spanish
8	PSC	Political Science and Government	SPC	Speech
9	SOC	Sociology	PSC	Political Science
10	SPA	Spanish	AHS	Allied Health Science



Top Ten CTE Course Prefixes Among Dually Enrolled Students (100% Course Sections*)

	2014-15		2017-18	
#	Prefix	Name	Prefix	Name
1	AHS	Allied Health Science	AHS	Allied Health Science
2	WLD	Welding	WLD	Welding
3	CPT	Computer Technology	CPT	Computer Technology
4	EEM	Industrial Electricity/Electronics	AUT	Automotive Technology
5	IMT	Industrial Mechanics	EEM	Industrial Electricity/Electronics
6	BCT	Building Construction Technology	IMT	Industrial Mechanics
7	AUT	Automotive Technology	CRJ	Criminal Justice
8	EGT	Engineering Graphics Technology	EGT	Engineering Graphics Technology
9	EGR	Engineering Technology	BCT	Building Construction Technology
10	CRJ	Criminal Justice	EGR	Engineering Technology

*100% course section means high school students only.



Dual Enrollment Costs

- Dual enrollment is a great opportunity, but not without cost: tuition and fees, books and materials, transportation, faculty salaries, etc.
- Costs are paid by the school, district, Lottery Tuition Assistance Program (LTAP), students and their families, or absorbed by the institution.





Dual Enrollment Costs Continued

Two-Year Institutions:

- For courses offered by many technical colleges, USC two-year campuses, and Spartanburg Methodist, students use the Lottery Tuition Assistance Program (LTAP) if they enroll in at least 6 credit hours in a degree seeking program.
- After LTAP is applied, many technical colleges waive (abate) the remaining tuition.
- Some technical colleges may apply discounts for students who do not qualify for LTAP.
- Some technical colleges offer the courses as contract courses; the cost charged to the school depends on the districts' needs and available resources.





Dual Enrollment Costs Continued

Funding and costs vary by institution (examples):

- **University of South Carolina (USC) for 2018 =**
 - USC Aiken
 - \$328 total per 4-credit hour course
 - \$262 total for a 3-credit hour course
 - \$433.25 per credit hour for traditional tuition
 - USC Beaufort
 - the District pays \$66.00 per credit hour for the course tuition
 - USC Columbia
 - does not currently offer dual enrollment classes
 - USC Upstate
 - \$66 per credit hour
 - USC two-year campuses (Lancaster, Salkehatchie, Sumter, Union)
 - reduced rate is \$95/credit hour. Students are not charged fees such as security/parking or technology fees. LTAP student receive a board-approved fee waiver;
 - Students must be enrolled in at least 6 hours in a semester and meet all other LTAP eligibility requirements to receive \$95 per credit hour in LTAP awards (up to 12 hours);
 - However students may enroll for more than 12 hours (in accordance with university policy of 18 hours per semester) and pay out of pocket;
 - Dual credit students not receiving LTAP also pay the same rate of \$95 per credit hour. Students are responsible for paying for any textbooks and supplies for their courses.





Dual Enrollment Costs Continued

Funding and costs vary by institution (examples continued):

- **Francis Marion University (FMU) for 2018 =**
 - Instructor provided by FMU costs \$2500 up to 15 students; extra \$150 per student up to 25 students maximum for a 3 credit hour course;
 - Qualified (SCACSCOC requirements) teacher provided by school, the charge is \$1500 for a 3 hour course; and instructor is paid \$500;
 - The school determines if there is a charge to the student.



Benefits of Dual Enrollment

According to a study by the Education Commission of the States (February 2014):

- There are increases in the number of public high schools offering dual enrollment programs;
- Dual enrollment programs have augmented college completion rates, most notably for minority and/or low income students;
- Minority and/or low-income students are less represented in dual enrollment programs.

The Commission is continuing to explore the benefits of dual enrollment for South Carolina students.

This study is available at: <https://files.eric.ed.gov/fulltext/ED561913.pdf>



References

- Advanced Placement and International Baccalaureate Credit Awards:
http://www.che.sc.gov/CHE_Docs/academicaffairs/apib_policy_May2016.pdf
- Dual Enrollment http://www.che.sc.gov/CHE_Docs/AcademicAffairs/DualEnrollment.pdf
- State Board of Education Regulation 43-234 <https://ed.sc.gov/districts-schools/state-accountability/high-school-courses-and-requirements/sbe-regulation-43-234-defined-program-grades-9-12-and-graduation-requirements1/>
- USC Sumter
https://www.sc.edu/about/system_and_campuses/sumter/study/dual_enrollment/de_ec_fa_q.php and USC Lancaster
https://sc.edu/about/system_and_campuses/lancaster/documents/admissions_records/dual_enrollment/dual_enrollment.pdf
- USC System (Memo) <http://www.sc.edu/policies/ppm/afaf204.pdf>
- SACSCOC Faculty Credentials <http://sacscoc.org/pdf/081705/faculty%20credentials.pdf>
- Statewide Articulation Agreement
http://www.che.sc.gov/CHE_Docs/AcademicAffairs/TRANSFER/transferable_courses.pdf
- Community College Research Center <https://ccrc.tc.columbia.edu/publications/what-happens-community-college-dual-enrollment-students.html>

Questions?

SC Commission on Higher Education

Mr. Jeff Schilz, President & Executive Director

jschilz@che.sc.gov 803-737-2155

Dr. Jennifer Almeda, Program Manager, Academic Affairs

Jalmeda@che.sc.gov 803-737-1929



SOUTH CAROLINA
Commission on Higher Education

Education and Economic Development Act Coordinating Council
February 19, 2019
Lexington Middle School

- I. Brief Remarks & Introductions
- II. View Student led IGP Sessions
- III. Panel Discussion
- IV. Next Steps
- V. Adjourn

Education and Economic Development Act Coordinating Council
May 22, 2019
Trident Technical College

- I. Brief Remarks & Introductions
- II. Presentation from Charleston Regional Youth Apprenticeship Program
- III. Discussion
- IV. Next Steps
- V. Adjourn



Charleston Regional Youth Apprenticeships

AT TRIDENT TECHNICAL COLLEGE



Our Future Today!

Trident Region
EMPLOYERS



Charleston Regional Youth Apprenticeships

Created through a **regional collaborative community partnership** that came together to:

Address the **critical workforce needs** within the region, and

Mentor the next generation of skilled workers for the Lowcountry.

Trident Region
EMPLOYERS



Youth Apprenticeship Model

- Job Related Education (JRE)
- On-the-Job Training (OJT)
- Scalable Wage (\$↑)



Apprenticeship Achievements



High School Diploma

Certificate from TTC in a career specific field in which all courses apply to an Associate Degree

National Credential from the U.S. Department of Labor

Two years of paid work experience

Exponential Growth!

2014-2015

- 1 Pathway – Industrial Mechanics
- 6 Companies
- 13 Youth Apprentices

2018-2019

- 17 Pathways – 9 Industry Sectors
- 130+ Companies
- 92 Youth Apprentices

2019-2020 *(at present moment)*

- 18 Pathways – 9 Industry Sectors
- 160+ Registered Companies
- 146 applicants *(with completed applications)*



YA Industry Sectors

HVAC

Manufacturing

Automotive Services

Engineering Services

Information Technology

Hospitality & Culinary Arts

Law Enforcement

Business

Health



2019 – 2020

Youth Apprenticeship Occupations

Industrial Mechanic

Engineering Assistant

Culinary Arts

Machinist

Computer Programming

Hotel Operations

HVAC Technician

Computer Networking

Security to Pre-Law Enforcement

Automotive Mechanic

Cybersecurity

C.N.A. to Pre- Nursing

Welding

IT Governance

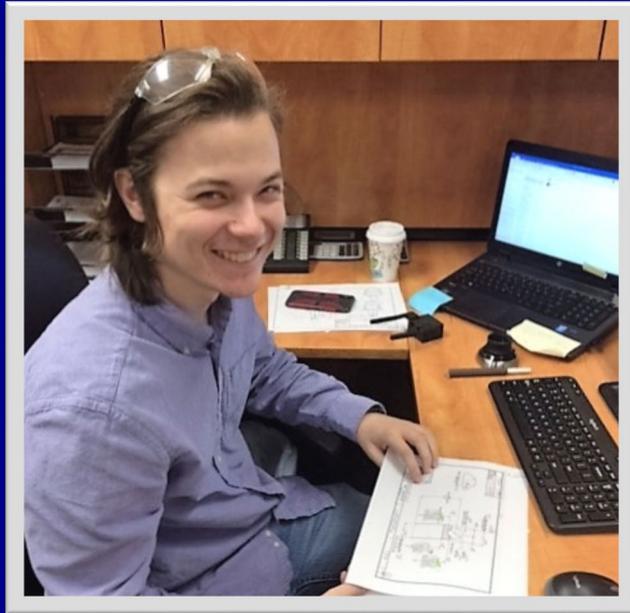
Emergency Medical Technician

Civil CAD Technician

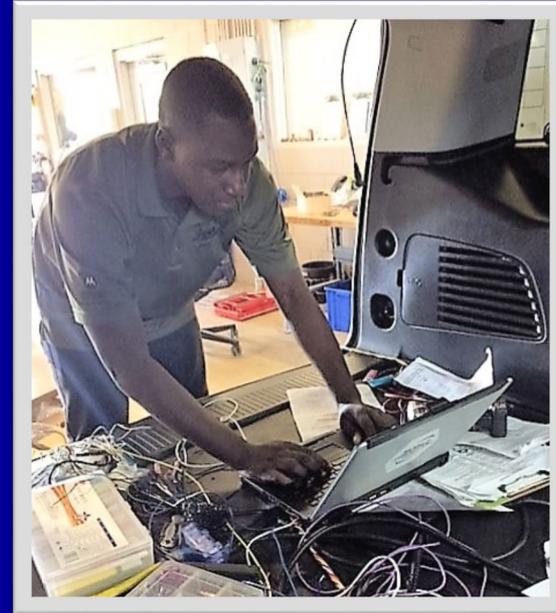
Accounting (Bookkeeper)

Medical Office Assistant

Engineering Assistant Apprenticeship Pathways



**Engineer 2+2 Pathway
(Calculus)**



**Technician Pathway
(Algebra)**



PARTNERSHIP TO ADVANCE YOUTH APPRENTICESHIP

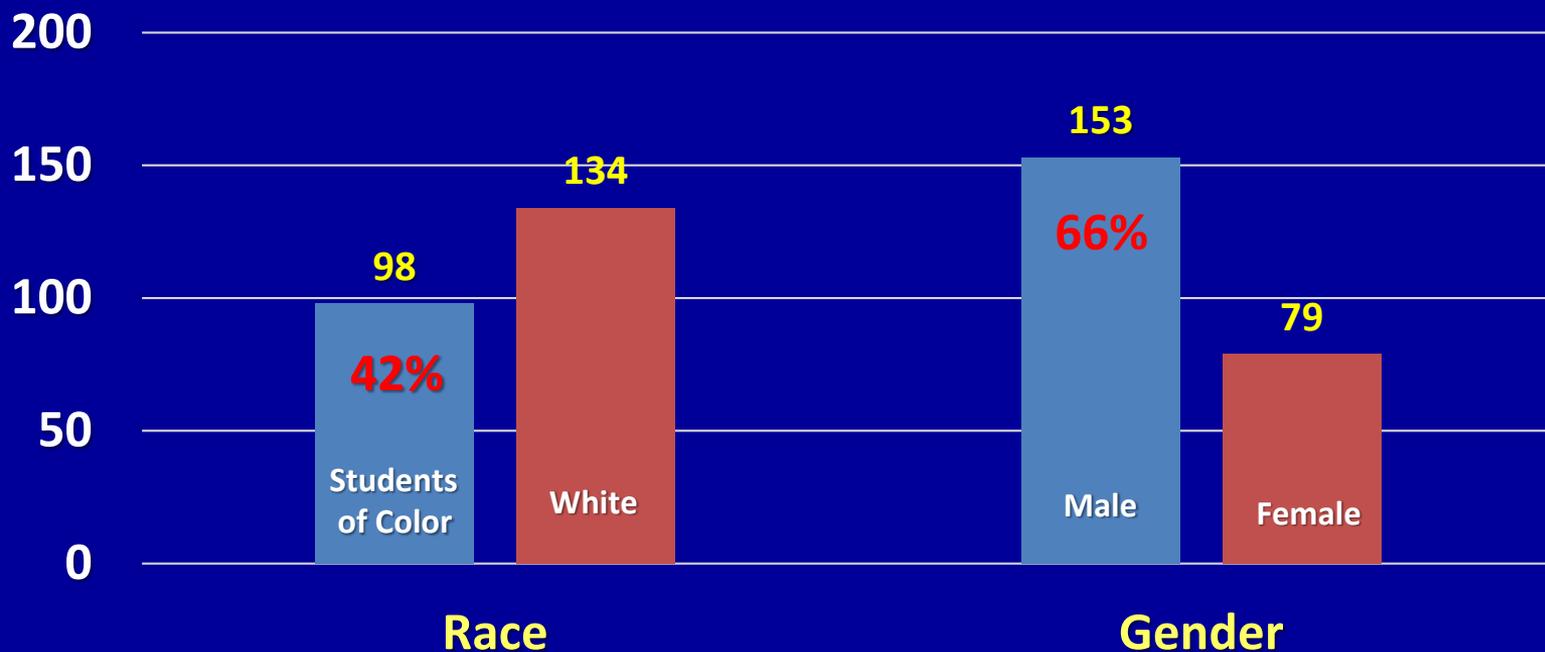
Guiding Principles for High-Quality Youth Apprenticeship

- » Career-Oriented
- » Equitable
- » Portable
- » Adaptable
- » Accountable



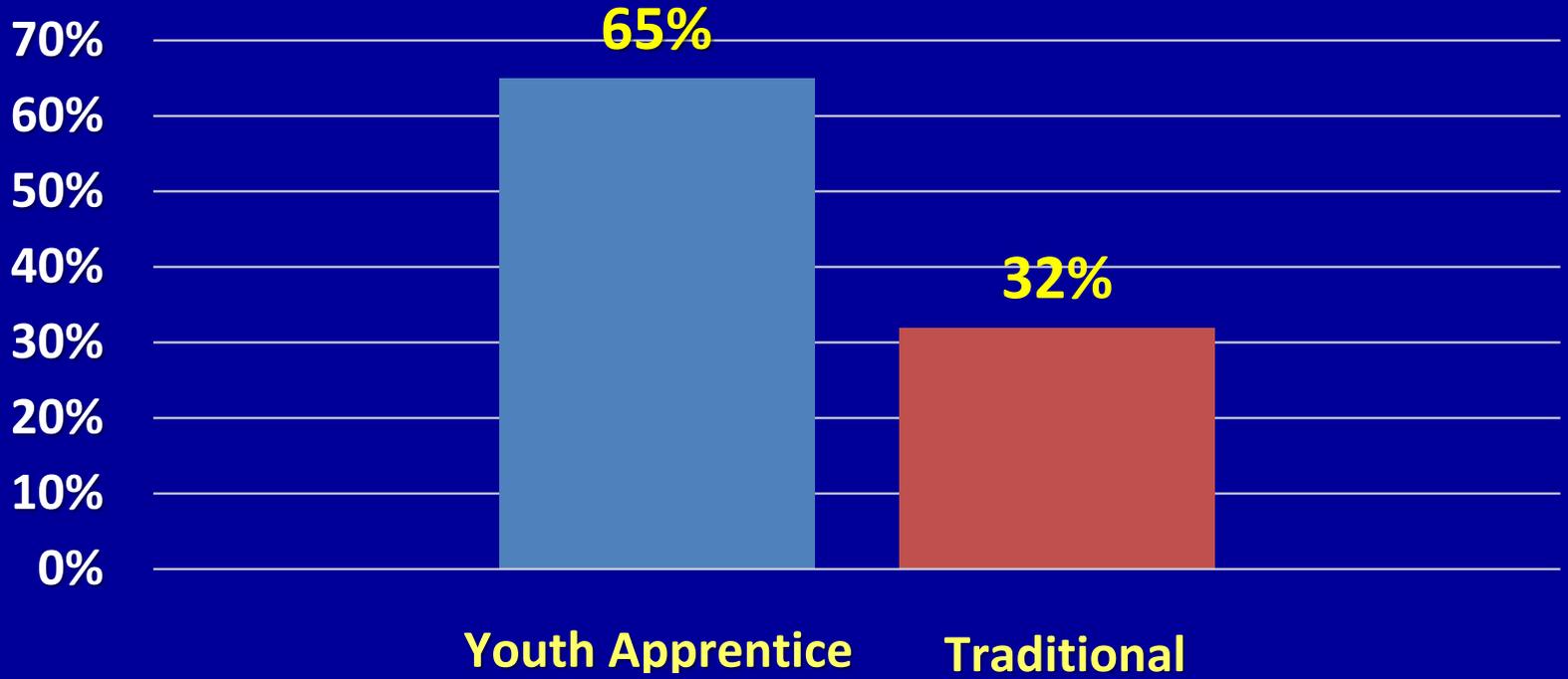
Youth Apprenticeship Demographics

232 Apprentices to Date (First 5 Cohorts)



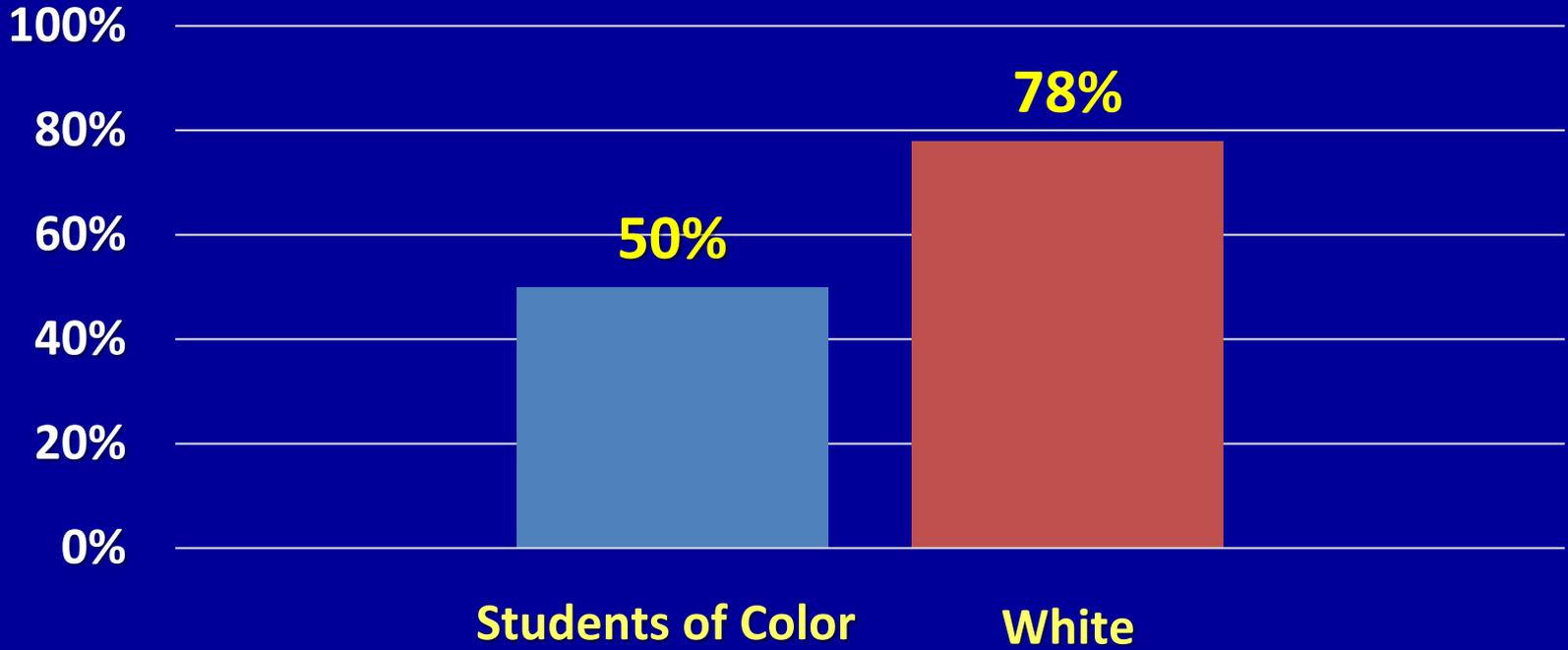
Youth Apprenticeship Outcomes

Program Completion Rates (First 3 Cohorts)



Youth Apprenticeship Outcomes

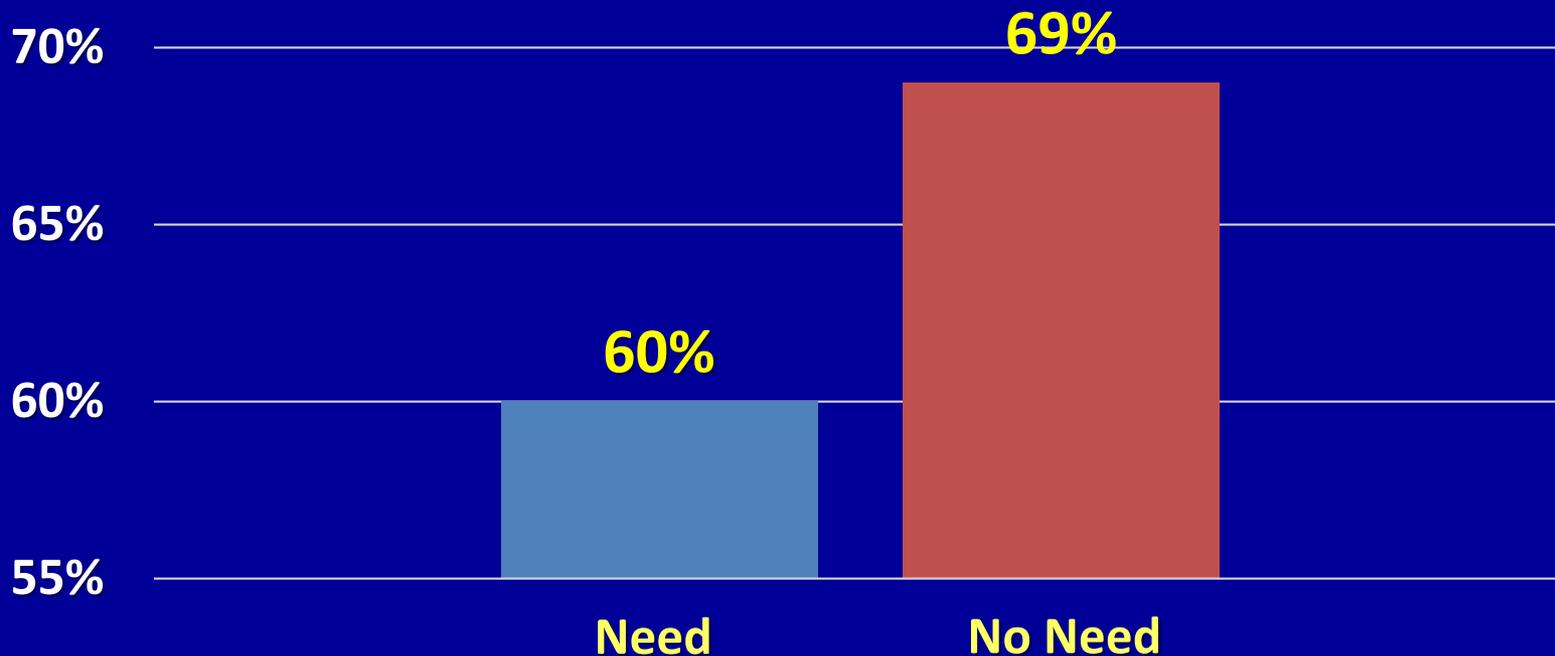
Program Completion Rates by Race





Youth Apprenticeship Outcomes

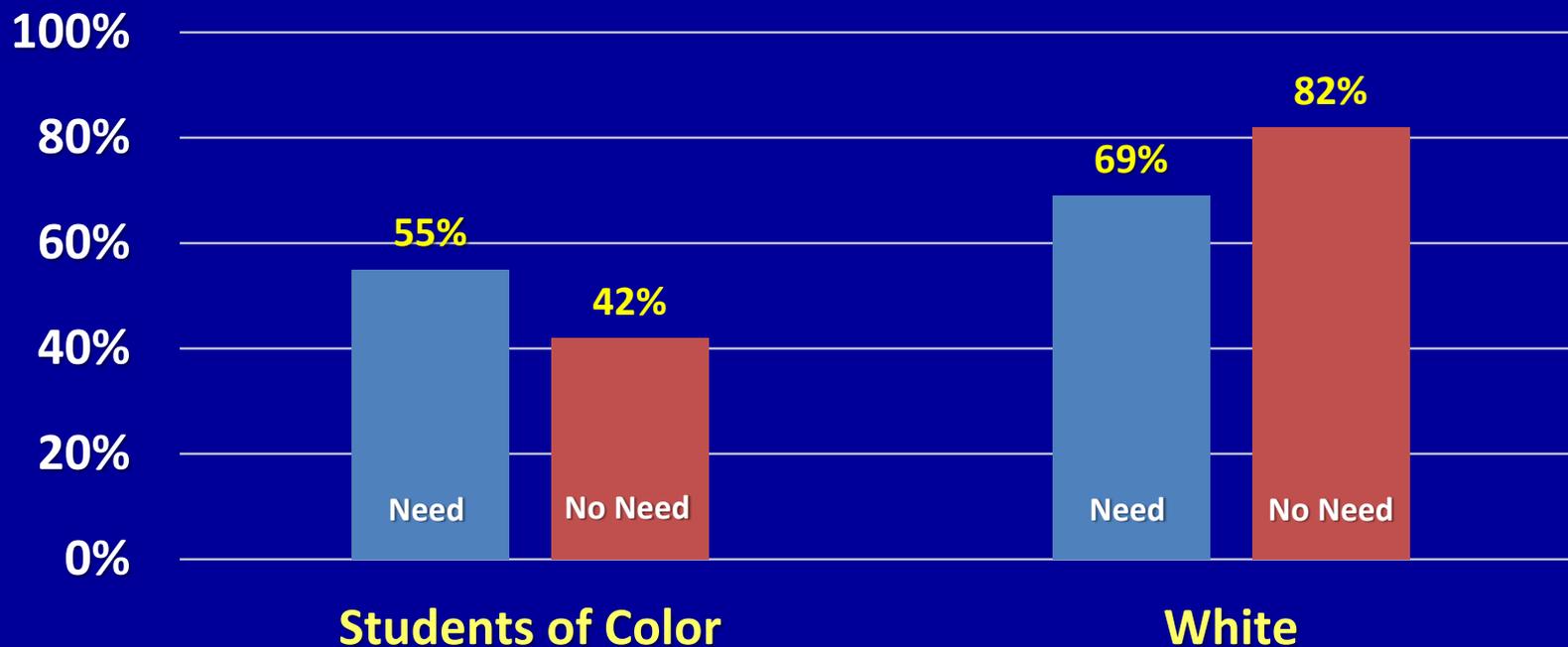
Program Completion Rates by Financial Need





Youth Apprenticeship Demographics

Completion Rates by Race and Need





Shannon Brennan



Charleston Regional Youth Apprenticeships

AT TRIDENT TECHNICAL COLLEGE



Our Future Today!

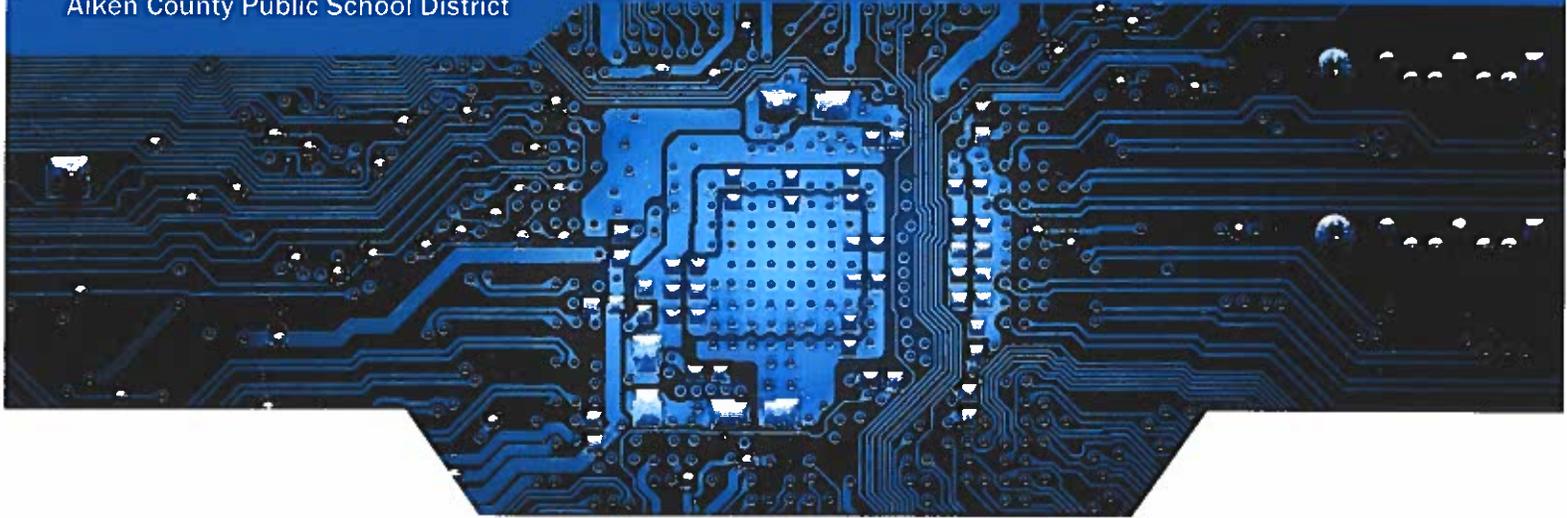
Education and Economic Development Act Coordinating Council
September 18, 2019
Department of Employment and Workforce

- I. Brief Remarks & Introductions
- II. Panel Discussion
- III. Committee Discussion
- IV. Next Steps
- V. Adjourn

High School Pathway: Cybersecurity Networking Certificate



A Partnership Between Aiken Technical College and
Aiken County Public School District



What is the Cybersecurity Networking Certificate?

Aiken County high school students have an opportunity to earn a Cybersecurity Networking Certificate through Aiken Technical College, which will give them the foundational skills needed for entry-level positions in IT security.

IT security is paramount to organizations as cloud computing and mobile devices have changed the way we do business. With the massive amounts of data transmitted and stored on networks throughout the world, it's essential to have effective security practices in place.

Those earning the Cybersecurity Networking Certificate will have the training and skills necessary to successfully prevent, troubleshoot and mitigate security issues on computing devices in a networked environment. Students will learn how to design secure networks as well as how to secure existing networks. Students will learn about threats to networks and the function and use of security tools to detect and remediate insecure networks.

Credits earned in the Cybersecurity Networking Certificate may also be used toward earning an Associate of Applied Science Degree in Computer Technology from Aiken Technical College.

Junior Year

- **Fall Semester:**
CPT 101-Introduction to Computers
IST 201-Cisco Internetworking Concepts
- **Spring Semester:**
CPT 257-Operating Systems
IST 202-Cisco Router Configuration

Senior Year

- **Fall Semester:**
IST 267-Network Vulnerability Assessment
IST 268-Computer Forensics
- **Spring Semester:**
CPT 209-Computer Systems Management
IST 291-Fundamentals of Network Security I

Industry Exam

May of Senior Year

Students will have the opportunity to take the CompTIA A+ or Security+ certification exam, both of which are industry recognized credentials. **A+ certification** shows that a person has the knowledge, skill and customer service skills necessary to successfully support PC equipment and users. **Security+ certification** indicates high-level skill and ability to secure a network and deter hackers.

For more information:

Those interested in participating in this pathway program should contact their high school counselor or contact the Aiken County Career & Technology Center.

Enrolling in and completing this program does not guarantee a passing score on the A+ or Security+ exams nor does it guarantee employment.

Greater Upstate

The Greater Upstate Manufacturing Partnership will have its third meeting will be held at ZF Transmissions on September 25, 2019.

The action teams are:

- **Action Team #1: Build a Workforce Pipeline into Manufacturing**
 - This team hosted a focus group of post-secondary partners to include Lander University, USC Upstate, Tri-County Tech, Greenville Tech and Piedmont. The focus of the group was to address the at-risk students that are currently around 4100 that drop out after one year in college.
- **Action Team #2: Address gaps in Middle- Skill Technical Jobs**
 - This team is currently identifying common skills sets among each of them. The goal is to see if there can be a common certification or curriculum from schools that is not defined by geopolitical boundaries.
- **Action Team #3: Regulations & Infrastructure**
 - Goal: Create a supportive climate for manufacturing growth by working with state policymakers to address regulatory issues and infrastructure needs.

Central

The Central South Carolina Manufacturing Partnership launched on June 10, 2019. The partnership will host its second meeting on September 24th at ETV.

The action teams are as follows:

- **Action Team #1: Strengthen the Workforce Pipeline into Manufacturing**
 - This team will reconvene on 9/24
- **Action Team #2: Strengthen business-to-business connections**
 - This team has decided to send out letters/emails to their fellow manufacturers asking to come together in a business to business meeting that they lead with topics that are critical to attracting and keeping a skilled workforce
- **Action Team #3: Promote Rural Lifestyle**
 - This team will reconvene on 9/24

South Coast

The South Coast region launched its first Sector Partnership in Healthcare on July 30, 2019 at the Charleston Metro Chamber of Commerce. The partnership will hold its second meeting on October 10, at the Charleston Metro Chamber of Commerce.

The action teams are as follows:

- **Action Team #1: Strengthen the Workforce Pipeline**
 - Goal: **Analyze health care workforce pipeline.** The team discussed starting by identifying critical occupations that are shared across the health care sector (RNs, Primary Care Physicians, Lab Techs and others). From there, analyze the number of students entering the workforce with appropriate training/credentials for these

occupations. This will allow the group to identify where there is a need to ramp up programs in order to match supply with demand.

- **Increase supply in high-demand areas.** The team discussed collaborating with teaching institutions to train students for high-demand roles. This may require subsidizing high-demand training if training costs are restricting supply of graduates, exploring alternative training models (i.e. online, nights/weekends), or expanding training programs in rural communities with high skill shortages
- **Action Team #2: Caregiver Support**
 - Goal: The team discussed exploring and replicating models from other states (i.e. AARP) to support caregivers more systematically.
- **Action Team #3: Transportation/Rural Strategies**
 - Goal: The team originally discussed transportation both for patients and health care workers as being a critical gap. The group agreed that urban and rural areas will require distinct strategies. Potential actions could include scaling transportation assistance programs, reimbursing fuel costs for caregivers, advocating for transportation funding, or bringing the major hospitals and primary care providers in the urban areas to focus on top 100 patients and address their transportation needs. After being made aware of the Tri-County initiative the group has decided that transportation would be better suited for that group.
- **Action Team #4: Alternative Delivery Models**
 - Goal: The team discussed a need to transform how health care is delivered in order to meet patient needs and bend the cost curve. This will require advocating for aligned incentives as well as deeper collaboration across the health care sector as a whole. One outcome of improving alternative delivery models would be reducing unnecessary emergency department visits. The team discussed a 3-pronged strategy:
 - Improving primary care by providing primary care in the ED setting, connect frequent users of emergency services to primary care and improving the connections between hospitals and FQHCs.
 - Using EMS workers more effectively by increasing their training and ability to deliver care.
 - Exploring alternative models like telehealth, mobile clinics, or CIN options.

Pee Dee

The Pee Dee region will launch their first Sector Partnership in Healthcare on October 8, 2019 at McLeod Health. The business champions include executive-level leaders of Prisma Health, Tidelands, MUSC-Florence/Marion, Brightwater and Wilson Senior Care.

EEDA Coordinating Council
Coordination of Efforts with the State Workforce Development Board, Regional Education Centers, Coordinating Council on Workforce Development (CCWD), and Sector Strategies Committee
September 18, 2019

Goals and Objectives:

- Confer with members of the Workforce Development Board to develop effective coordinating protocols between the Board and the EEDA Coordinating Council.
- Assess activities of the Regional Education Centers and develop strategies to strengthen and promote those activities.
- Cooperate with the other groups identified above to continue to coordinate and refine the alignment and implementation of SC Sector Strategies with the work and policies of the EEDA Coordinating Council.
- Cooperate with the above groups to implement a longitudinal data study necessary for more effective data-sharing among agencies.

The Committee has been focusing on three key areas:

1. Data analysis for strategy development.
2. Aligning workforce and education strategies around one comprehensive workforce plan.
3. Supporting regional alignment of workforce, education, and economic development with business and industry.

Data Analysis

The Committee is developing a small scale analysis where through data matching, the number of graduates who successfully obtain employment is identified along with the occupational training they received prior to graduation.

- The Post-Secondary Workforce Evaluation Report analyzed the employment outcomes and wage progression of individuals who obtained a post-secondary credential or degree.
- The Committee agreed that a similar analysis of high-school graduates could provide valuable insight into whether students are leaving HS with the necessary occupational skills.

The Committee compared the occupations listed between the SC Department of Education's Approved Credential Obtainment List, the 2018 Supply Gap Analysis and the SC WIN Critical Occupational Shortage List, and found that there similarity between all three lists.

- The Committee concluded that one universal list is not recommended since career advisors match students with occupations that mirror their interests whereas state or federal programs will use occupational demand to determine which trainings should be funded.

Comprehensive Workforce Plan

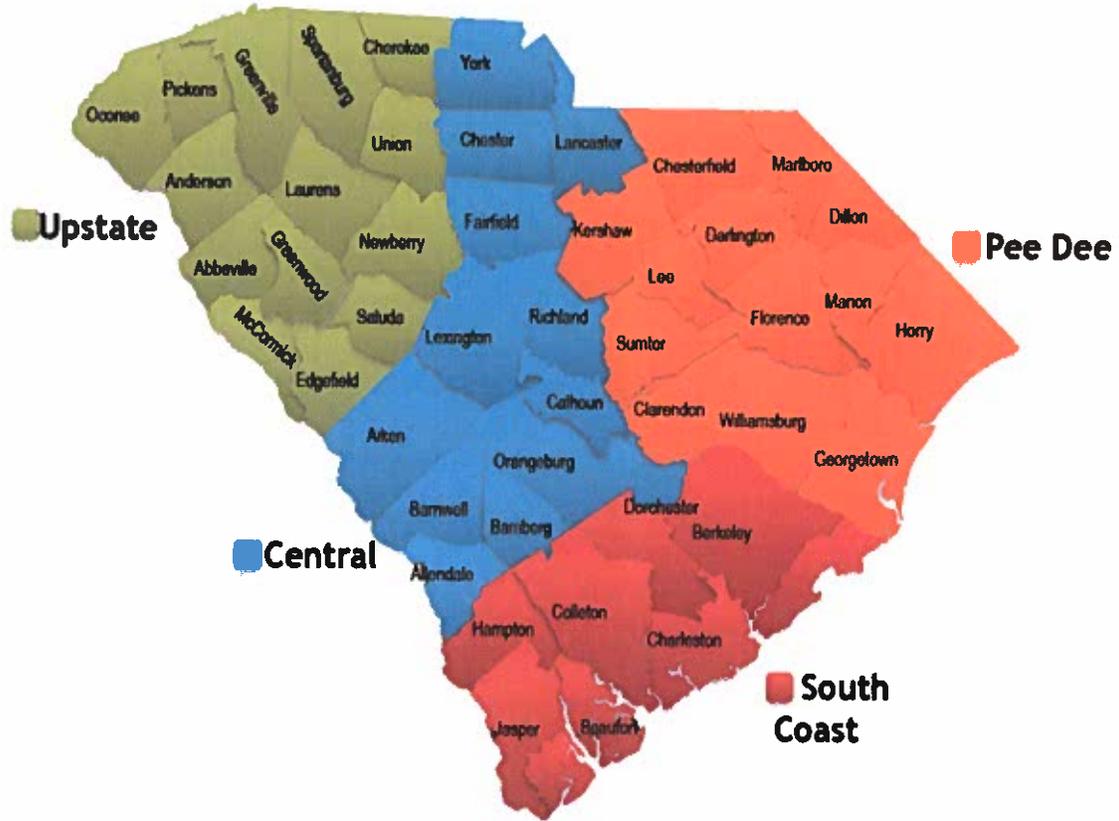
- The Committee recommends one universal workforce plan to align strategies and resources across workforce and education around common goals.
- This will strengthen the alignment between CCWD, EEDA and the State Workforce Development Board, and serve as the platform for the Perkins Act Plan (due May 2020) and the WIOA Plan (due April 2020).
- Members of the Committee are developing a scope of work to contract with a third-party facilitator.

Regional Alignment

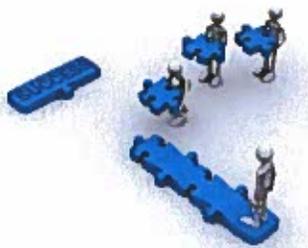
The Committee recommends alignment between education, workforce and economic development regionally through sector partnerships.

- Sector partnerships are where business leaders from the same industry sector in a labor market region, who work together with partners from education, workforce development, and economic development to tackle the common workforce and other competitiveness needs of their industry.
- A two-day training was hosted by members of the Committee, providing regional team representatives technical assistance on sector partnerships, to include the development and distribution of a Sector Partnership Toolkit.
- Sector Partnerships have been stood-up with more than 150 businesses currently participating across the state.
- The Committee is evaluating how best to support the regional partnerships and insure sector partnerships are a vehicle in aligning education and workforce.

Workforce Planning and Implementation Regions



Secondary to Post-Secondary Alignment



The EEDC subcommittee was assigned three topics to review for better secondary to postsecondary alignment:

- Dual Enrollment/Dual Credit;
- Remediation; and
- Transfer and articulation.

After a review of existing resources and individual agency efforts, the group found that there could be a better way to collaborate and showcase enhanced or new pathways from secondary to postsecondary education (the charge of the committee), and as a result, enhanced or new pathways to the workforce.

Subcommittee working group Recommendation(s):

The subcommittee's working group recommends a gaming portal which would provide information on dual enrollment, adult education, postsecondary opportunities, and in-demand occupations. We believe students' (the primary audience) lack of awareness of available resources is a fundamental challenge, and thus a fundamental necessity is to better engage the general public and specific stakeholders about opportunities before, during, and post-secondary education. An interactive website or app in the form of a gaming platform serves as a fun and informational resource. The resource will chart various paths for individuals in high school or adult education into the workforce, as individuals can play as various avatars to simulate real world choices. South Carolina ETV has offered to be the developer of the resource.

1. Dual Enrollment/Dual Credit

2017-18		
Top 5 Courses Among Dual Enrolled Students		Top 5 CATE* Courses Among Dual Enrolled Students
1 English		Allied Health Science
2 Math		Welding
3 Psychology		Computer Technology
4 History		Automotive Technology
5 Sociology		Industrial Electricity/Electronics

*Career and Technology Education

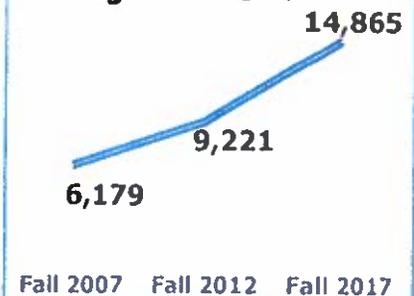
Dual Enrollment:

- “Dual enrollment” courses are college courses taken in high school for which the student receives **only college credit** and not high school credit.

Dual Credit:

- “Dual Credit” courses are college courses taken in high school for which the student receives **both high school and college credit**.

Number of HS Students Taking College Courses

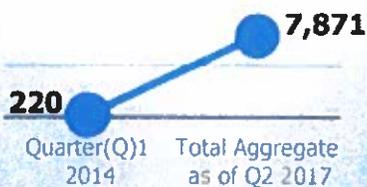


- There were 14,865 high school students taking college courses in Fall 2017, a 141% increase since Fall 2007.

≈ 170K 9-12
200 HS -

2. SC TRAC (South Carolina Transfer and Articulation Center)

Student Accounts Created



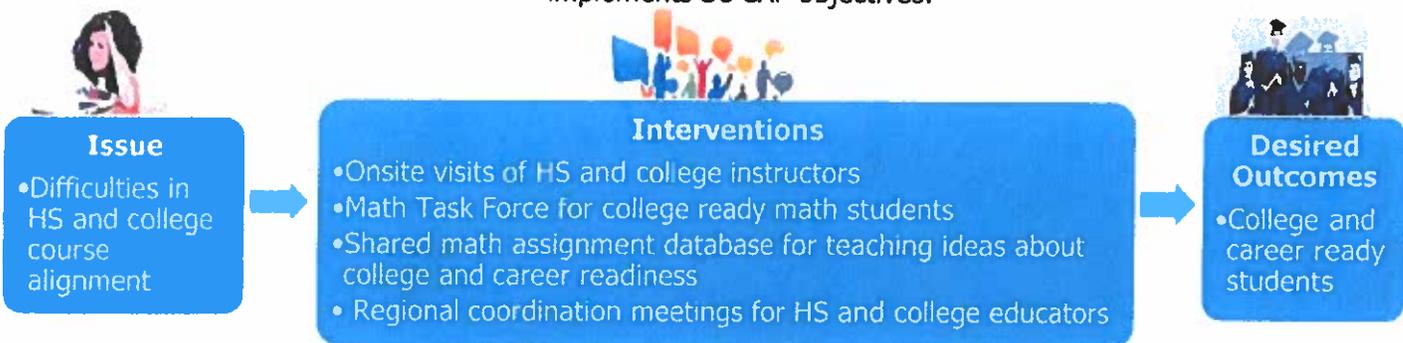
SC TRAC is a Commission on Higher Education (CHE) portal enabling students to **reliably** verify transfer of earned credits towards their major at the new institution, minimizing costs, repeated coursework, and time to earn the degree.

Transfer Agreements Added to the Site



3. Center for College & Career Readiness (CCR) – SC Course Alignment Project

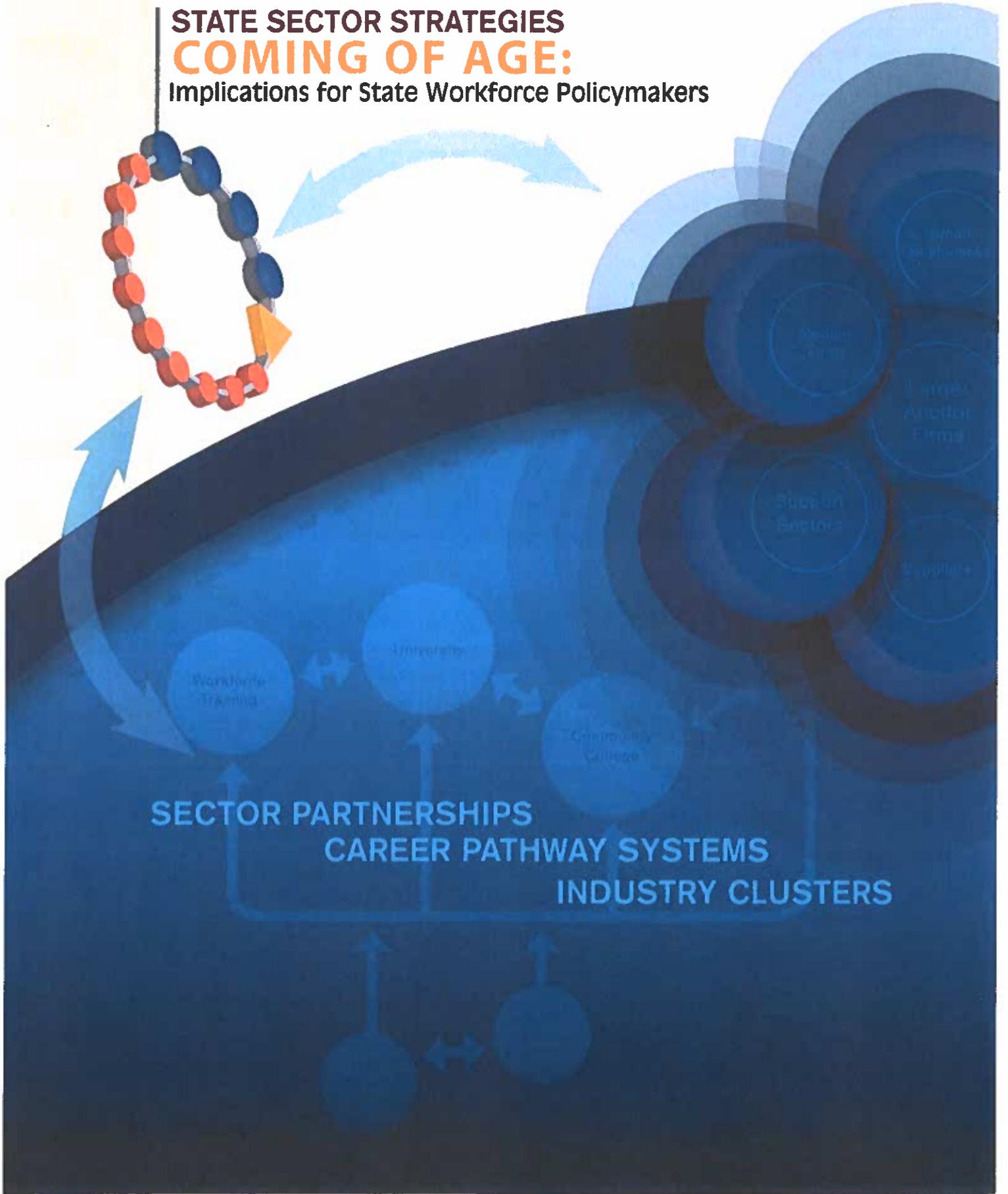
The South Carolina Course Alignment Project (SC CAP) was established to align paired courses in English, mathematics, and science to promote a seamless transition for students from high school to postsecondary education. The Center of Excellence for College and Career Readiness at Francis Marion University currently implements SC CAP objectives.



Resources:

- Advanced Placement and International Baccalaureate Credit Awards
http://www.che.sc.gov/CHE_Docs/academicaffairs/apib_policy_May2016.pdf
- Dual Enrollment http://www.che.sc.gov/CHE_Docs/AcademicAffairs/DualEnrollment.pdf
- Dual Enrollment/Credit Guidance Document
http://www.che.sc.gov/Portals/0/CHE_Docs/academicaffairs/acap/acap-1-15-09/agendaitem_4a_guidancedoc.pdf
- Dual Credit <http://ed.sc.gov/instruction/career-and-technology-education/professional-development/teachers-counselors-administrators/dual-credit/>
- State Board of Education Regulation 43-234 <https://ed.sc.gov/districts-schools/state-accountability/high-school-courses-and-requirements/sbe-regulation-43-234-defined-program-grades-9-12-and-graduation-requirements1/>
- SC TRAC <https://www.sctrac.org/>
- SC CAP <http://www.screadiness.org/sc-course-alignment/>
- SC Readiness <http://www.screadiness.org/>

STATE SECTOR STRATEGIES
COMING OF AGE:
Implications for State Workforce Policymakers



THE NATIONAL GOVERNORS ASSOCIATION (NGA), founded in 1908, is the collective voice of the nation's governors and one of Washington, D.C.'s, most respected public policy organizations. Its members are the governors of the 55 states, territories and commonwealths. NGA provides governors and their senior staff members with services that range from representing states on Capitol Hill and before the Administration on key federal issues to developing and implementing innovative solutions to public policy challenges through the NGA Center for Best Practices. NGA also provides management and technical assistance to both new and incumbent governors.

The NGA Center for Best Practices is the only research and development firm that directly serves the nation's governors and their key policy staff. Through the NGA Center, governors and their policy advisors can:

- Learn about what works, what doesn't and share lessons learned
- Participate in meetings of leading policymakers, program officials and scholars
- Obtain specialized assistance

For more information about NGA and the NGA Center for Best Practices, please visit www.nga.org.

Corporation for a Skilled Workforce (CSW), founded in 1991, catalyzes nationwide transformative change in education, economic, and workforce development through research and action. CSW is dedicated to reimagining work and learning as a means to increasing economic opportunity and sustainable prosperity for vulnerable people, companies, and communities.

CSW works extensively with states, communities, and national organizations to design, develop, implement and evaluate change strategies that:

- Increase educational attainment of adults, particularly through expanded use of market-relevant credentials and transformation of community college approaches to workforce development;
- Improve access to robust career navigation supports for workers and learners;
- Expand and deepen business-education collaboration, including through increased use of industry sector partnerships; and
- Help communities develop sustainable jobs and prepare residents for emerging careers.

For more information about CSW, please visit www.skilledwork.org.

NATIONAL SKILLS COALITION (NSC), is a broad-based coalition working toward a vision of an America that grows its economy by investing in its people so that every worker and every industry has the skills to compete and prosper. We engage in organizing, advocacy, and communications to advance state and federal policies that support these goals—policies that are based on the on-the-ground expertise of our members.

NSC was founded in 1998 as The Workforce Alliance in response to a series of federal policies that signaled the end of national investments in the skills of America's workers at a time when skill gaps were growing in key U.S. industries. We've shown that diverse stakeholders can find agreement around specific reforms that will improve a variety of workforce education and training policies. We continue to mobilize support for a new national skills agenda that cuts across public policies, and simultaneously serves a wide range of U.S. workers and industries. NSC is governed by a Board of Directors and advised by a national Leadership Council drawn from the ranks of business, labor, community colleges, communitybased organizations, and the public workforce system.

State Sector Strategies Coming of Age:
Implications for State Workforce Policymakers

ACKNOWLEDGEMENTS

This paper was written by Lindsey Woolsey of the Woolsey Group, LLC, and Garrett Groves of the National Governors Association with editing by Martin Simon of the National Governors Association, in cooperation with Larry Good of the Corporation for a Skilled Workforce and Eric Seleznow of the National Skills Coalition. It is a joint product of Corporation for a Skilled Workforce, National Skills Coalition, and the National Governors Association Center for Best Practices. Funding to support its development was provided by the Charles Stewart Mott Foundation. Special thanks to David Moore, Lauren Stewart, and Mary Jo Waits of the National Governors Association Center for Best Practices, and Taryn MacFarlane and Nancy Laprade of the Corporation for a Skilled Workforce for their input.

Cover graphic and all graphics in this paper designed by Lindsey Woolsey of the Woolsey Group, LLC, with support from Garrett Groves of the National Governors Association, and produced by Axie Breen Graphic Designs. Thank you to the National Governors Association, Corporation for a Skilled Workforce, and the National Skills Coalition for their input and support.

TABLE OF CONTENTS

Executive Summary	2
Introduction	4
Better Connections with Industry’s and Workers’ Needs Yield Better Outcomes	4
Sector Strategies Address Persistent State Workforce Policy Challenges	5
Sector Strategies in Practice	6
Addressing Emerging Skill Gaps: Connecting Employers with the Workers They Need	6
Engaging Directly with Industry: Working Across Boundaries to Identify and Address Specific Workforce Needs	7
Aligning State and Local Public Programs: Coordinating State Efforts and Braiding Disparate Funding Streams	8
A State Policy Framework	11
Eight Areas for State Action – A State Sector Strategy Framework	12
How Colorado Implemented the State Sector Strategy Framework	13
Sector Strategies in the Next Decade	14
Integrating Career Pathway Programs, Sector Strategies and Industry Clusters	14
Conclusion	18

BOXES

- Box 1. Eight Areas for State Action – A State Sector Strategy Framework (p.12)
- Box 2. How Colorado Implemented the State Sector Strategy Framework (p.13)
- Box 3. The Private Industry Council of Westmoreland-Fayette (p.15)
- Box 4. A Short History of Sector Strategies (p.19)

EXECUTIVE SUMMARY

Today more than half the nation's states are exploring or implementing sector strategies, making the model the most consistently adopted approach to meeting businesses' need for skilled workers and workers' need for good jobs. Sector strategies are among the few workforce interventions that statistical evidence shows to improve employment opportunities for workers and to increase their wages once on the job.¹ Employers report increases in productivity, reductions in customer complaints, and declines in staff turnover, all of which reduce costs and improve the competitiveness of their companies.² This is likely why an estimated 1,000 sector partnerships are operating across the country.³

Sector strategies are partnerships of employers within one industry that bring government, education, training, economic development, labor, and community organizations together to focus on the workforce needs of an industry within a regional labor market. At the state level, they are policies and investments that support the development of local sector partnerships. They are welcomed by governors, who are increasingly focused on the needs of critical industries and workers. Amid the challenges of the slowly recovering national economy, sector strategies can do the following:

- **Address current and emerging skill gaps.** Sector strategies offer a mechanism to focus scarce resources on industries that are major job providers in an area, as well as to focus comprehensively on the workforce skills, from entry level to advanced, required in a regional economy.
- **Provide a means to engage directly with industry across traditional boundaries.** Businesses operate in economic regions that may cross city, county, and state lines and education and economic development areas. Sector strategies work across the boundaries to identify and address specific workforce needs in almost every industry.
- **Better align state programs and resources serving employers and workers.** Intense demand for balancing budgets at the state level threaten initiatives in education, training, economic development, and other essential state services. Sector strategies help to reduce inefficiencies and streamline state efforts by coordinating various programs and braiding disparate funding streams intended for the same purpose.

This paper offers a snapshot of sector strategies today, an overview of what makes them different from traditional workforce and economic development programs, and a description of actions that state administrators and policymakers can take as part of a policy framework to support their creation and effective operation. It shows how sector strategies are evolving to integrate potentially powerful supply-side and demand-side activities, providing a means to integrate career pathway initiatives focused on the education and skills development of workers with the kind of high-growth industry clusters that have been the focus of economic development initiatives for decades.

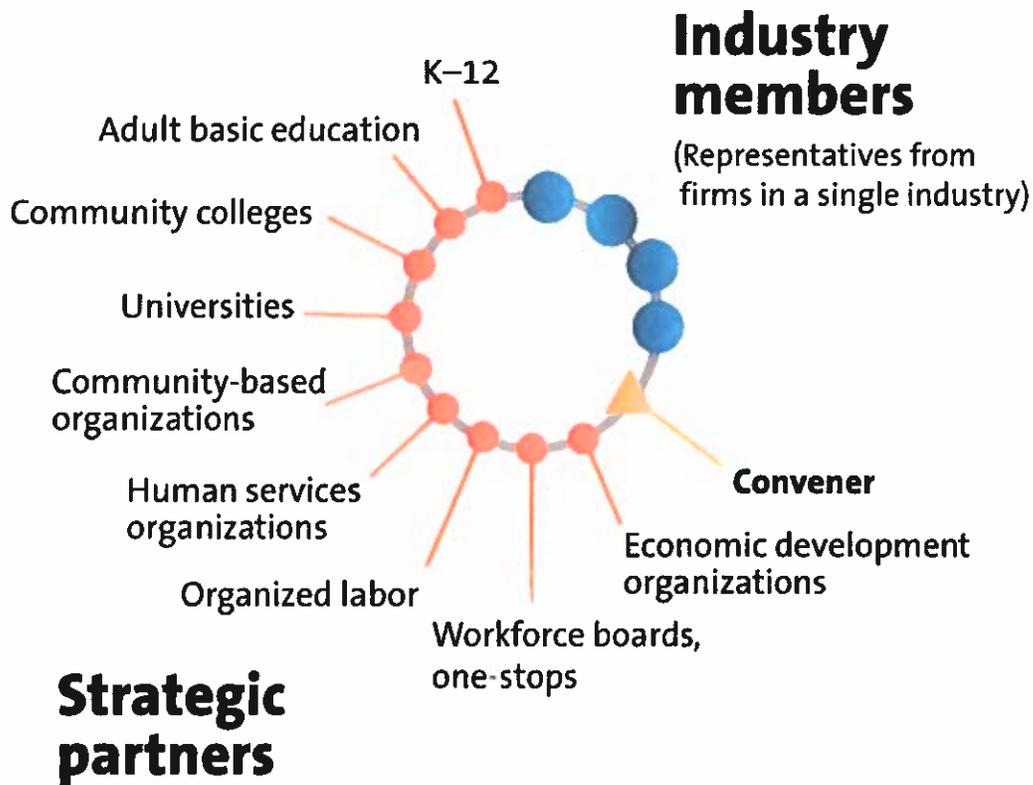
1. S. Majumder, J. Hoek, C. Oyster, M. Comas-Forgas, and D. Schwartz, "Tying in to Local Labor Markets: Findings from the Sectoral Employment Study," Public/Private Ventures, July 2010. http://www.ppv.org/11301411-4-10/sectors0323_presentation.pdf

2. L. Gattuso, "BEST Beyond Us: Employer Perspectives on How to Build a Better Workforce," Center for Urban & Regional Change, October 2004. http://www.majorsforchange.com/bschwp/BEST_2005_index_00_2015mp.pdf; "Perspective on Industry and Training in Pennsylvania," Bureau of Pennsylvania Workforce Development, April 2008. <http://www.pwde.state.pa.us/pubs/industry.asp?docid=5114&id=575072&view=2>

3. R. Mangan, "Sector Strategy: A Practical Sector Analysis," National Network of Sector Partnerships, Inside Outside Community Economic Development, 2010. <http://www.insideoutside.org/sites/default/files/2010/SectorStrategy.pdf>

Sector Partnership

The partnership addresses common needs of employers and generates coordinated solutions that benefit workers.



INTRODUCTION

State policymakers and administrators of agencies concerned with economic growth and prosperity face two critical tasks: adding and expanding businesses in a down economy, and meeting the needs of business for a skilled workforce. They need to ensure that residents have the education, training, and skills to obtain good jobs. At the core of these challenges is a national skills gap. The United States currently is falling far short of supplying enough appropriately skilled workers to meet industry needs current and future. By 2020, the U.S. economy will have an estimated shortfall of 1.5 million to 3 million workers with college degrees.⁴ It will require another 4.7 million workers with postsecondary certificates to meet economic demands.⁵ The country's education and training systems must remain, and in some cases become, the core of the solution. Those systems will be required to better coordinate their activities and to align strongly and consistently with the needs of industries.

The costs of not addressing these skills shortages are high. States and regional labor markets cannot rely solely on attracting talent from beyond their borders. Nor can job seekers risk spending time and resources on training or education programs that do not lead to a good job. Therefore, all states and regions must consider and implement workforce strategies that make the connections between industry's need for skilled labor and workers' needs for job-relevant education and training. Sector strategies are among the few interventions with a growing body of evidence showing improved employment opportunities and wages for workers and increased productivity and other positive outcomes for employers.⁶

Better Connections with Industry's and Workers' Needs Yield Better Outcomes

The U.S. workforce system⁸ is often criticized as a sum of disconnected parts, with worker training poorly matched to industry demand, a lack of focus on industries that are the most important to local economies, and duplicative business outreach and workforce training services. Sector strategies respond to those criticisms. At the regional labor market level, they are partnerships of employers in one industry that bring together government, education, training, economic development, labor, and community organizations to focus on the workforce needs of their industry. At the state level, they are policies and investments that support the development of local sector partnerships. A growing body of evidence demonstrates their effectiveness for employers and workers.



In 2009 in Pennsylvania, 84 percent of surveyed employers participating in industry partnerships reported significant increases in productivity.

When employers find effective ways to work together with the public education and training systems—particularly the small and midsized firms that are increasingly responsible for U.S. job creation—they can improve their profitability

4. J. Manyika, S. Lund, B. Augustu, and S. Ramaswamy, Help Wanted: The Future of Work in Advanced Economies, McKinsey Global Institute, March 2012, <http://www.mckinsey.com/download/centers-for-economic-development/Help-wanted-The-future-of-work-in-advanced-economies-fut-report.pdf>; A. Carnevale, Help Wanted: Projections of Jobs and Education Requirements through 2018, Center for Education and the Workforce, Georgetown University, June 15, 2010, <http://www9.georgetown.edu/grad/edps/hpi/cew/pdfs/HelpWanted.pdf>

5. Carnevale, Help Wanted: Projections of Jobs, A. Carnevale, S. Ross, and A. R. Hanson, Certificates: Gateway to Good Employment and College Degrees, Center for Education and the Workforce, Georgetown University, June 2012, <http://www9.georgetown.edu/grad/edps/hpi/cew/pdfs/Certificates-FutReport-061812.pdf>

6. Maguire et al., Tuning in to Local Labor Markets.

7. Industry Partnerships in Pennsylvania, booklet, Pennsylvania Workforce Development, April 2009, <http://www.portal.state.pa.us/portal/servlet?open=514&objID=575072&mode=2>

8. Defined here as publicly funded workforce development programs including the Workforce Investment Act for youth, adults, and dislocated workers; federal and state adult education programs; state-funded incumbent worker training programs; Employment Services and WIA One-Stop Centers; community and local employer-led workforce training programs; and community college programs.

In a survey of employers participating in sector partnerships in Massachusetts, 41 percent reported reduced turnover; 19 percent reported less rework on the job; 23 percent reported fewer customer complaints; and 100 percent of the companies said that participation in a sector partnership was valuable.⁹

48% **EXIT** POVERTY

The Aspen Institute found that 48 percent of participants in sector-based programs exited poverty, based on earnings alone.¹⁰

Workers also benefit from involvement in a sector partnership. Navigating the education market to secure the knowledge-based skills required in today's economy is as daunting as navigating the labor market. Thousands of credentials exist, including full degrees, short-term certificates, and professional licenses. Which ones do employers accept? Which education and training programs are flexible enough to allow working adults to complete them and obtain their credential? Public sector programs serving

industry and job seekers through a sector partnership are better able to align the needs of employers with the career paths of workers, and the results for employees are higher wages and better jobs. A 2009 random-assignment evaluation of three sector partnerships showed that worker participants earned significantly more (18 percent more, or \$4,500 over 24 months) than the control group¹¹ The reason was that they were more likely to work, worked more consistently, and worked in jobs with higher wages. They also had higher-quality jobs, as measured by benefits such as health insurance, paid vacation, and paid sick leave.¹²

Such outcomes help explain why an estimated 1,000 regional sector partnerships are operating across the country, and more than 25 states are exploring or implementing sector strategies as a way to address industry needs through education and training programs.¹³ They are known by different names in different states: Industry Partnerships in Pennsylvania, Skill Alliances in Illinois, and Clusters of Opportunity in California. Massachusetts has been using a sector strategy approach for almost three decades, funding hundreds of local partnerships through the Workforce Competitiveness Trust Fund. Pennsylvania's investment has seeded more than 90 industry partnerships since 2005, more than 40 of which are still active. Washington State launched its first Skill Panels in 2000 and since then has funded more than 100 public-private partnerships among business, labor, and education. State policymakers in these states and others implementing sector strategies see them as an effective way to address the challenges they face as the economy recovers from the recession.

Sector Strategies Address Persistent State Workforce Policy Challenges

Amid the challenges of the slowly recovering national economy, sector strategies can help policymakers address a set of challenges that almost every state faces:

- **Current and emerging skill gaps.** Sector strategies offer a mechanism to focus scarce resources on the industries that provide high proportions of jobs for residents and on the role of a skilled workforce—from entry level to advanced—in a regional economy.

9. Callahan, "BEST Benefits," Industry Partnerships in Pennsylvania.

10. S. Maguire, J. Freely, C. Olyarik, M. Curshaw, D. Schwartz, "Training in Local Labor Markets: Evidence from the Skill Panel Program in Oregon," *Public Policy Institute*, July 2010, <http://www.drawinguppublicpolicy.com/assets/325/publication.pdf>.

11. Maguire et al., "Training in Local Labor Markets."

12. *Ibid.*

13. Mangaf, "Sector Snapshot: Sector Strategies at a Tipping Point: A Fact Sheet," Corporation for a Skilled Workforce, October 2010, <http://www.economicstrategies.org/library/2010/snapshot-state-sector-activity>.

- **Traditional geopolitical and program boundaries that prevent consistent, seamless engagement with industry.** Businesses operate in economic regions that may cross city, county, and state lines, as well as workforce, education, and economic development areas. Sector strategies work across the boundaries to identify and address specific workforce needs in almost every industry.
- **Misaligned state programs and resources serving businesses and workers.** Intense demand for budget balancing at the state level threatens initiatives in education, training, economic development, and other essential state services. Sector strategies help to reduce inefficiencies and streamline state efforts by coordinating programs and braiding disparate funding streams intended for the same purpose.

These challenges are large and complex, and in a slowly recovering economy, no single public system, employer, or job seeker can address them alone. Sector strategies provide states an approach to workforce, education, and economic development that brings stakeholders together effectively.

SECTOR STRATEGIES IN PRACTICE

Addressing Emerging Skill Gaps: Connecting Employers with the Workers They Need

Evidence is growing of emerging skill gaps across the economy as education and training systems fail to keep pace with employer demand for higher skills. In 2011, the McKinsey Global Institute found that 30 percent of U.S. companies had job vacancies that remained open for more than six months, even though national unemployment levels stood above 9 percent.¹⁴

Sector strategies aim to fill those types of vacancies by working in a region to align the skill needs of industry with the education and training programs in the area. These partnerships use labor market information to stay informed of shifting demands, and because they regularly convene and listen closely to employers in their industry of focus, they can inform education partners about how best to structure their curriculum offerings and guide workers to jobs.¹⁵



Statewide Power Generation Skill Panel

In Washington, the Pacific Northwest Center of Excellence for Clean Energy convenes a statewide Power Generation Skill Panel that involves major power generation plants (coal, hydro, and wind), public utilities, organized labor, workforce boards, and community colleges. One of the most valuable contributions of the Skill Panel is its ongoing development of skills standards manuals for critical middle-skill occupations in the energy industry, including substation operators, power plant electricians, combustion turbine technicians, and others. As the convener of the Skill Panel, the Center of Excellence (housed at Centralia Community College) conducts focus groups and surveys workers and their employers to identify and verify the precise skills, knowledge, competencies, and work functions of the most critical occupations in the industry. These standards are used by employers to adjust official job descriptions and advancement requirements. Educators and apprenticeship programs also use them to create training that is exactly right for the jobs available in the industry.¹⁶

14. Muehlenstein, 152; Wernick, "The Future of Work in Advanced Economies."

15. L. Worsley, *Moving Beyond the Court: The Story of Job Strategies-Maryland Corporation for a Skilled Workforce*, 2011. http://www.skillsworks.org/media/moving_beyond_court/; Pacific Northwest Center of Excellence for Clean Energy, <http://www.cocoece.org/about/skill.html>.

16. Pacific Northwest Center of Excellence for Clean Energy. "Articulation Model at <http://www.cocoece.org/about/skill.html>."

Staying informed of shifting demand is critical in today's economy, not only because education and training programs must be able to shift on a dime to teach new technologies and skills, but also because traditional views of education and jobs outcomes are vastly outdated.

Forty years ago, nearly three of every four jobs in the country required only a high school diploma, or less. Today, just 37 percent of jobs are available to those without some form of postsecondary education.¹⁷ Millions of Americans must pursue additional classroom instruction or training to find employment and, once they do, to gain access to better wages and upward mobility. The increasing demand from both employers and workers for at least some education after high school is the leading reason why postsecondary certificates have displaced both master's degrees and associate degrees as the second-most-common type of postsecondary credential, after the four-year bachelor's degree.¹⁸

In March 2010, the governor of Maryland launched Skills2Compete Maryland, an initiative to increase the number of Marylanders who attain at least two years of postsecondary education. The initiative is aligned with a priority in the 2009 Governor's Workforce Investment Board five-year strategic plan to make sector strategies a key way to connect workers to jobs. Skills2Compete Maryland is aimed at the 40 percent of jobs in the state defined as "middle-skill occupations," requiring more than a high school diploma but less than a four-year degree. On average the jobs pay above the state median income.¹⁹ They are in health care, advanced manufacturing, skilled construction, professional services, transportation, logistics, energy, and other industries found in almost every regional economy.

Low-skilled and low-income workers can also benefit from sector strategies and gain entry to middle-skill occupations in growing regional industries if they can obtain the support they need to complete education or training that is genuinely targeted to employer needs. Because a core premise of sector strategies is strong coordination across training and support programs, they can be a powerful aid to advance low-income and low-skill workers who need comprehensive supports and case management to succeed.

Engaging Directly with Industry: Working across Boundaries to Identify and Address Specific Workforce Needs

A firm's ability to stabilize or grow depends on obtaining the right assistance at the right time for a given problem.²¹



Training Partnerships

The BioTechnical Institute of Maryland, Inc. (BTI) is a sector partnership that trains low-income Baltimore residents to become entry-level technicians in the city's emerging biotechnology industry. BTI made an important discovery about high turnover in those positions: employers generally believed a bachelors degree was needed for them, but workers in the positions generally used them as temporary stepping-stones before returning to school for more advanced degrees. In fact, the position required only short-term training in the skills needed for working in a sterile environment. Getting to the bottom of what employers actually needed opened up an entirely new industry to low-skilled Baltimore residents.²⁰

17. A. Carnevale, N. Smith, J. R. Stone, P. Kobernick, B. Sievermeyer, and K. A. Green. *Career Clusters: Forecasting Demand for High School Through College Jobs*. Center on Education and the Workforce, Georgetown University, November 2012. http://www0.georgetown.edu/grad/gppia/html_csw_pdfs/clusters_complete_update1.pdf

18. Carnevale, Help Wanted: Projections of Jobs, Careers and Education. Center on Education and the Workforce, Georgetown University, November 2012. http://www0.georgetown.edu/grad/gppia/html_csw_pdfs/help_wanted_update1.pdf

19. H. Holzer and R. Lerman, *America's Forgotten Middle-Skill Jobs: Education and Training Requirements in the Next Decade and Beyond*. The Skills2Compete Campaign of The National Skills Coalition. *Monthly Labor Review*, 2007. <http://www.bls.gov/news.release/america/13a.pdf>

20. M. Conway. *Sector Strategies for Low Income Workers: Lessons from the Field*. 2007 (Washington, DC: Aspen Institute)

21. Cathy, "BEST Benefits: Industry Partnerships in Pennsylvania"

Few approaches allow public programs to be as well focused, as comprehensive, or as responsive as a sector strategy.

Every state has multiple labor markets. In fact, every county and city is part of different labor markets for different industries, which crisscross and overlap each other. A labor market is based on concentrations of firms within one industry, commuter sheds for workers in that industry, and shared supply chains. Since a sector partnership focuses on a single critical industry, it operates within that industry's labor market, across city, county, and state lines, as well as across workforce areas, school districts, and economic development regions.²² The geography relevant for a sector partnership, therefore, varies based on how the particular industry operates.

The South Central Pennsylvania Food Manufacturers' Training Consortium is a local sector partnership that operates across two counties and within a single workforce investment area. It serves a concentration of about 40 midsize food manufacturers (including Snapple and Quaker Maid), providing training to more than 2,000 workers between 2005 and 2009.

An example of a much larger sector partnership is the Automotive Manufacturing Technical Education Collaborative (AMTEC).²³ The collaborative began as a customized training project of Toyota and the Kentucky Community and Technical College System (KCTCS). It quickly grew into an automotive sector partnership including other American, Asian, and German auto manufacturers, as well as their supply chains. Today the AMTEC partnership has expanded across numerous economic, education, and political boundaries along the I-65 and I-75 corridors from Michigan to Texas. It includes 32 community colleges and labor organizations across 13 states, all focused on the goal of making sure that a new generation of skilled, globally competitive autoworkers emerges. AMTEC uses a sector partnership to identify worker skill needs across two critical job classifications—production and maintenance. A career pathway approach is applied to make sure that coursework is modular, flexible, and contextual and produces stackable credentials. Locally, colleges and organized labor work with manufacturers in their area to customize training, but up and down the I-75 corridor, AMTEC ensures that curricula and credentials are standardized throughout the sector partnership.

Aligning State and Local Public Programs: Coordinating State Efforts and Braiding Disparate Funding Streams

For years states and local organizations have blended and braided diverse public and private funding to get sector partnerships started and to keep them going. Funding sources include the following:

- Workforce Investment Act (WIA) Title I training funds
- WIA Title II adult education funds
- Governors' WIA discretionary funding;
- State general revenue
- Incumbent worker training funds
- Temporary Assistance to Needy Families (TANF) funds
- Vocational rehabilitation funds
- State education funds
- Philanthropic contributions
- Direct employer contributions
- Fee-for-service funds
- Funds from community organizations, such as Goodwill or United Way

22. A Sivaram Pillay and Richard Winkler, "How to Build a Better TRIF for the Global Economy" (Washington, DC: National Governors' Association Center for Best Practices, 2010).

23. Ibid.

Of these, federal and state sources have historically been the two largest for sector partnerships, representing 60 percent of total funding for the field.²⁴ In the context of severe state budget constraints and threats to key federal programs such as the Workforce Investment Act, reliance on federal and state resources is a risk. Pennsylvania watched state general funding for workforce training in industry partnerships decline over three years from \$20 million to \$9 million, then to \$6 million, and finally to zero in 2011.

Today the state's industry partnerships are operating on a \$1.6 million budget, intended to cover staff time for coordination, and they face critical challenges in providing the level of training to employer members and workers that the partnerships had provided for the past six years.

As federal and state resources shrink, leveraging diverse funding sources will be important. However, if sector strategies are to evolve into a different way of operating for workforce and education systems, then they must be supported by a strong set of integrated state policies.

Today's resource-tight environment may bring about the next leap in the evolution of sector strategies, moving the field from start-up grants and cobbling together multiple, divergent resources, to aligning multiple systems and programs by embedding sector strategies into their program and funding policies.

Consider that sector strategies should be a core way to do business for workforce and education systems. States can do the following:

1. Secure funding from state legislatures for general support of sector strategies or for targeted support of education and training programs aimed at critical industries. Support can be in the form of direct investments or can be indirect, such as industry tax credits for training programs.

AZ

Arizona began formally promoting sector strategies in 2010. Like other states, it focuses on local area training on the sector partnership approach.

Unlike other states, Arizona is unique in that they have achieved success without any additional funding for the start-up and expansion of sector partnerships across its regions. State leadership achieved this by providing customized, intensive technical assistance to local areas, and by embedding sector strategies into plans, grants, and guidance across the board, including the state workforce plan, guidance for local workforce plans, and apprenticeship and career pathway programs.

Arizona made sector strategies a common framework for a recent joint application by its Commerce Authority and Department of Economic Security to the U.S. Department of Labor's Workforce Innovation Fund. The state also purchased access to real-time vacancy data on behalf of local areas, and plans are to integrate training on this data with training on sector strategies.

Arizona created a Sector Strategy Committee as part of the Governor's Workforce Investment Board, which includes leadership from the departments of education, economic security, and commerce. An additional group called "Friends of Sector Strategies" is made up of more than 65 representatives (and it is growing) from industry associations, community organizations, local workforce boards, economic development agencies, tribes, and others. The Friends are responsible for giving input to the state as well as building the sector strategy buzz around the state.

2. Build policy partnerships among state agencies concerned with the success of specific industries, such as departments of energy, transportation, or health services. These agencies have choices concerning the use of their resources, including some federal program allocations, in which sector strategies could be made more explicit.
3. Embed language and requirements that support sector strategies into all relevant formula programs, grants, and new initiatives, including statewide workforce investment plans and guidance to local areas; statewide or regional economic development plans; career pathway programs and initiatives; apprenticeship programs; state incumbent worker training programs; and customized training funds from both workforce development and economic development.
4. Use sector strategies as a connecting framework across systems and programs when applying for grants from federal agencies. Many of the American Recovery and Reinvestment Act grants included strong sector partnership language and principles. The same is true for proposed federal funding in Congress and for recent grants from the U.S. Departments of Labor (such as the Workforce Innovation Funds solicitation) and Commerce (such as the Economic Development Administration's Job Accelerator grants).
5. Explore new uses of revenue sources that could directly support sector strategies, including unemployment tax offsets (historically used with individual companies but potentially available for customized training for groups of employers in one industry), sales tax reserves (some local areas have won voter approval for using sales tax revenue to support training programs), or layoff aversion funds (which usually go to individual companies but could be used to target an industry).
6. Approach industry directly. Industry associations, as well as individual companies with a large presence in a state, may have an interest in investing in sector strategies, especially if they see the value of systems' aligning to support the workforce needs of their industry as whole. A recent Government Accountability Agency study of 14 sector initiatives reported that all used employer cash and in-kind resources to support their efforts.²⁵

²⁵ *Inclusive Collaborations Between Workforce Boards and Employers Help Meet Urgent Local Workforce Needs* (Washington, DC: Government Accountability Office, GAO-12-97, February 14, 2012), <http://www.gao.gov/products/GAO-12-419/>.



A STATE POLICY FRAMEWORK

With the economy showing some signs of recovery and business hiring increasing, it is more critical than ever for state policies to support a framework of employer-driven education, training, and postsecondary strategies to help ensure that residents possess the skills and credentials to secure and retain employment. Given the promising results of sector partnerships, a growing number of state policymakers are including sector strategies in statewide policy frameworks that guide local and regional efforts to address skills gaps. When done appropriately, it is a proven strategy for effectively addressing the challenges that nearly all states face.

Sector Strategies – State Policy Framework



Because sector strategies demonstrate results for employers, job seekers, and public resources, more and more states are turning to them to more effectively align and leverage public programs. More than 25 states are at various stages of implementing sector strategies. Most are championed by state workforce investment boards and implemented by state labor or workforce development departments, or their equivalents. These state initiatives vary in their scale and scope of activities.

Illinois and **Michigan** funded regional “skills alliances” across their states for more than seven years. Both focused almost exclusively on high-demand, middle-skill jobs and training across a variety of critical industries. **California, Colorado, Minnesota, New York, North Carolina, Oregon, Wyoming,** and **Wisconsin** also provided grants to local workforce boards or other regional organizations to implement sector partnerships. **Arizona, Idaho, Maryland,** and **Oklahoma** have provided sector strategy training opportunities for local stakeholders, including regional workshops and learning academies. **Arkansas, Kentucky,** and **Wisconsin** emphasized career pathways as part of their sector strategies and in some cases use colleges as key organizers.

Governors and other state leaders can play a key role in promoting the development of sector partnerships by pursuing state action in eight areas, based on the experiences of states implementing sector strategies. Taken as a whole, they create a framework for a state sector strategy. These actions are described in Box 1 and illustrated in Box 2 with the example of the evolution of Colorado’s state policy framework.

Box 1. Eight Areas for State Action – A State Sector Strategy Framework

1. Create a Sector Strategy Committee that includes representatives of industries critical to the state economy, leadership from key public systems such as workforce, higher education, economic development, and employment support services; and legislative members. Sector strategy committees are forums for information sharing and joint, sector-focused policymaking. **Colorado's** committee, part of its Governor's Workforce Investment Board, meets quarterly to help guide state sector strategies.
2. Align Policies across Systems. Just as it takes practical coordination among workforce, education, and economic development programs to create a successful sector partnership, it takes policy coordination at the state level to remove barriers and align strategies so that local stakeholders can work better together. **Minnesota's** Department of Employment and Economic Development created a map of various programs serving workers and employers across multiple agencies and a common vision to bring them into alignment.
3. Cultivate Business Champions to promote the sector strategy approach with other employers, industry associations, and legislators. By bringing together employers from diverse industries and regions, **Pennsylvania** built an informal but powerful, bipartisan coalition of private sector champions who rally for industry needs and investments in training to support sector partnerships.
4. Build Legislative Support to secure funding to support sector partnerships, as **Massachusetts** and **Pennsylvania** have done, and to put sector strategies into statute, as have **Pennsylvania** and **Washington**. Other states secure funding to support education and training for specific key industries, for example, **Oklahoma's** tuition tax credit for aerospace training.
5. Provide Good Data and Industry Expertise to local stakeholders so that they can make good decisions about industries, occupations, worker populations, and regional labor markets. Nearly every state that is implementing sector strategies produces industry reports, cluster analyses, and guidebooks. For example, **Arizona** used multiple industry databases to put together regional profiles of critical industries. **Minnesota** and **Oklahoma** additionally hired former industry leaders as experts in health care, manufacturing, and aerospace to work directly with local partnerships to help with data, trends, technical assistance, and recruitment of local employers into partnerships.
6. Find and Leverage Funding to Support On-the-Ground Implementation. Sector partnerships need dedicated staff to coordinate and facilitate. Creating such a staff takes time and resources. Most states have used governor's WIA discretionary funds to seed the development of local partnerships, but with shrinking WIA budgets, they have turned to other funding sources. In **New York** and **Virginia**, for example, foundations provided seed funding for regional sector strategies. **California** used the statewide interest in green jobs to secure U.S. Department of Energy funding via their state's energy commission to provide sector partnership start-up grants.
7. Provide Training and Capacity Building for Local Programs. **Arizona, Idaho, Maryland** and **Oklahoma** convened "Sector Strategy Academies," in which local teams representing the workforce, economic development, community colleges, community-based organizations, organized labor, and other stakeholders come together to learn about the sector partnership model, including effective industry analysis, employer engagement, partnership building, and design of industry-relevant training programs. **Colorado** and **Wyoming** offer such academies every year for the growing number of participants in local sector partnerships, providing opportunities for shared learning and for making connections among partnerships that might be focused on the same industry.
8. Develop a Shared Message, Track Outcomes, and Share Success Broadly. Messaging campaigns can help various constituents and stakeholders understand that sector strategies are a "new way of doing business," not just another "program." States can be especially important in helping local partnerships measure and track their impact on workers and employers. **Massachusetts** dedicates an evaluation staff to track outcomes, create evaluation toolkits, and create reports that share the outcomes of local partnerships.

Box 2. How Colorado Implemented the State Sector Strategy Framework

CO

The State's Evolving Role

- 2007: Colorado Department of Labor and Employment (CDLE) investigates best practices, including learning from other states by participating in a Policy Academy on Sector Strategies organized by the National Governors Association, Corporation for a Skilled Workforce, and National Network of Sector partners;
- 2008: CDLE commissions industry analyses and reports in the fields of health care, energy, and manufacturing to document how local areas create sector partnerships in these critical industries.
- 2008: The Colorado Workforce Development Council creates a Sector Strategy Committee of industry leaders and agency heads from workforce, education, and economic development to guide policies and practical development of sector partnerships (the committee is still active).
- 2008: CWDC repurposes WIA discretionary funds to create start-up grants, including guidance to local areas to establish sector partnerships. New grants are competitively provided for the next three years.
- 2008–2011: Local workforce areas and their partners in education and economic development are convened for annual Sector Strategy Academies to learn from one another and from national sector practitioners.
- 2008: An online portal is launched to allow local partnerships to share with one another on an ongoing basis.
- 2011: A train-the-trainer curriculum and tools are created to expand the concept and practice of sector partnerships to new areas and organizations.
- 2012: CDLE and CWDC proactively integrate the concept of sector strategies into new state initiatives that affect local areas and into proposals for federal funding, so that the practice remains a core way of doing business.

WHAT DOES IT ADD UP TO ON THE GROUND?

Across Colorado, 13 Active Sector Partnerships have been seeded, including the Pueblo Manufacturing Consortium

The Convener: Pueblo Workforce Council.

The Partners: 3 workforce areas, Colorado State University, Pueblo Community College, Pueblo Economic Development, Colorado Association of Manufacturing and Technology, Small Business Development Center.

The Champion Employers: Evraz Rocky Mountain Steel, Holcim Cement, Krage Manufacturing, Kurt Manufacturing, Oliver Manufacturing, and Vestas.

Outcomes: Revised machining and welding curriculum and programs; incumbent worker training focused on electrical and mechanical maintenance and quality control; mobile learning lab trailers to expose youth to careers in manufacturing; and leveraged industry funding for a Manufacturing Center of Excellence focused on R&D, technology transfer, and career pathway development. Employer members are now requesting that the partnership expand to Colorado Springs.

SECTOR STRATEGIES IN THE NEXT DECADE

Integrating Career Pathway Programs, Sector Strategies, and Industry Clusters

Where sector strategies are coming of age, they are increasingly being used to integrate existing supply-side strategies, such as career pathway programs, with local industry demand, specifically demand from high-growth industry clusters, which have been the focus of economic development initiatives for decades. Sector strategies intersect with both.

Policymakers interested in economic development can often find it challenging to determine which public sector interventions directly correlate to job creation and thus regional growth. Despite numerous industry surveys that show the importance of a skilled workforce to industry competitiveness, too often the goals of growing the economy and advancing workers into high-paying occupations are seen as separate ones.²⁶ It can be difficult to determine how best to use limited public resources.

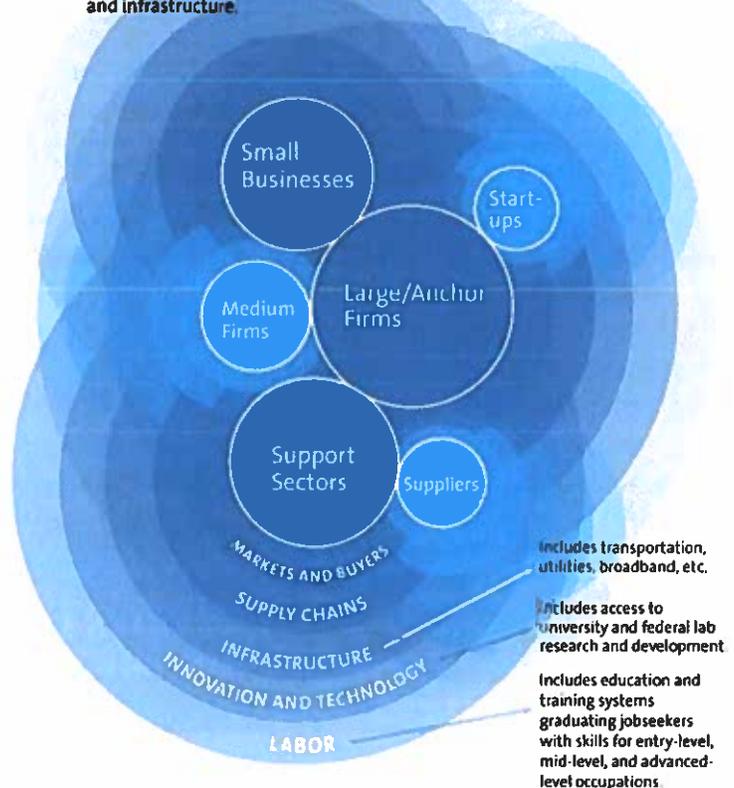
States and local leaders can, however, learn from existing efforts in their states that demonstrate positive change in the factors that lead to growth. For firms in almost every industry, those factors are the availability of an appropriately skilled labor pool at all levels (from entry to advanced) and the presence of an industry cluster that provides access to shared resources, innovation, and markets.

Businesses have naturally clustered for decades, indeed for centuries. We see, for example, the automotive industry concentrated in Detroit, film in Los Angeles, finance in New York, and high-tech companies in Silicon Valley. Industry clusters are networks of firms related by common markets, supply chains, infrastructure, innovation and technology, and labor pools.

Sector partnerships, by definition, engage employers within a single industry to address their common workforce needs. In the best cases, sector partnership coordinators do more. They understand that by simply bringing employers in the same industry together, they trigger informal and formal industry cluster activity, including firm-to-firm networking that results in growth of existing firms, attracting new ones, and job creation (for a detailed example, see Box 3).

Industry Cluster

An industry cluster consists of large and small firms in a single industry. Firms in industry clusters benefit from synergies of association related to shared labor, sources of innovation, suppliers, markets, technology, and infrastructure.



26 L. Woolsey, "The Policy Intersection between Sector Strategies and Low-Income Workers: The State Responsibility to Make the Connection," South Foundation, Corporation for a Skilled Workforce, 2007, <http://www.southfoundation.org/sites/default/files/Integrating%20Sector%20and%20Low%20Income%20Policies.pdf>

Box 3. The Private Industry Council of Westmoreland-Fayette

PA

In western **Pennsylvania**, the Private Industry Council of Westmoreland-Fayette convenes the Green Alliance Committee, a sector partnership focused on the energy efficiency sector. The partnership began with eight employers focused on the immediate training needs of solar, wind, and geothermal component parts manufacturing, as well as a growing commercial and residential retrofitting sector. Within a year, employer members brought other employers to the table, and the number of companies involved grew to more than 40. It is now an active sector partnership including elected officials, economic development entities from four counties, and local community colleges. Its primary focus is training for new and incumbent workers, but the alliance also directly supports the growth and expansion of the region's energy cluster.

Private sector members report that the committee's value is its networking power. It is a forum for sharing, joint policy creation, and practical problem solving related to common issues of competitiveness. Participating companies have entered into shared purchasing agreements that reduce costs for local materials, significantly increasing the market for local suppliers. Retrofitting companies have added new positions based on their ability to secure contracts for retrofitting schools and hospitals because of their newly trained workers. A small commercial HVAC company quadrupled its workforce as a result of expanded connections to residential retrofitting needs. A manufacturer of vermiculite, a material used to insulate batteries, discovered through the alliance that the material could be used in retrofitting insulation, as well as in green soil for potted plants and gardens. A steel fabricator discovered an expanded market in windmill towers, based on new connections with wind power parts suppliers. A small woodstove pellet manufacturer connected with oil and gas drilling companies via the alliance and proceeded to research uses of wood pellets as an absorber of waste products, thereby creating an entirely new product line in a significant market. That firm expanded from five employees to almost 30 and now purchases sawdust from sawmills in three counties. Another member makes Pyrex glass for solar panels. Via the alliance he added an entirely new production line to meet regional demand, creating 60 new jobs.

Of all the factors that motivate and grow industry clusters, however, none is more universally important than human resources.²⁷ And for that reason, several education and training programs and many states are increasingly meeting the demands of specific industries—whether for entry-level, mid-level, or advanced skills—by building career pathway programs.

Career pathways offer a clear sequence of coursework and credentials aligned with the natural paths of advancement in an industry, and often across similar occupations in related industries, for students, job seekers, and incumbent workers returning to school. When done right, career pathway programs engage regularly with employers in their target industry so as to constantly and accurately assess the skills and knowledge they need and re-calibrate curricula, programs, and credentials. They also coordinate among multiple education and training providers to build a complex of courses and credentials that impart and demonstrate qualifications from work readiness to advanced-level skills.

No single education institution can do this alone. In reality, effective career pathways are therefore not programs; they are systems. They rely on the same key principles as effective sector partnerships: convening a core group of employers in the target industry to drive curriculum and credential development along career pathways and across occupations in their industry.

27. Stuart Rosenfeld, *Governors Guide: Cluster-Based Strategies for Growing State Economies*, Innovation Series (Washington, DC: National Governors Association Center for Best Practices and Council on Competitiveness, 2016). <http://www.nga.org/files/live/sites/NGA/files/01/0702/INNOVATION/CLUSTERS.PDF>.

They tightly coordinate divergent training, education, and support programs, so that individuals access the right program at the right time to advance into a job.

Often a sector partnership focuses on a subsector (such as precision manufacturing or allied health care) of a larger cluster (manufacturing or health care broadly). They do so simply because a subsector may be of a more manageable size, with a more feasible scope of occupations for which to address workforce needs.

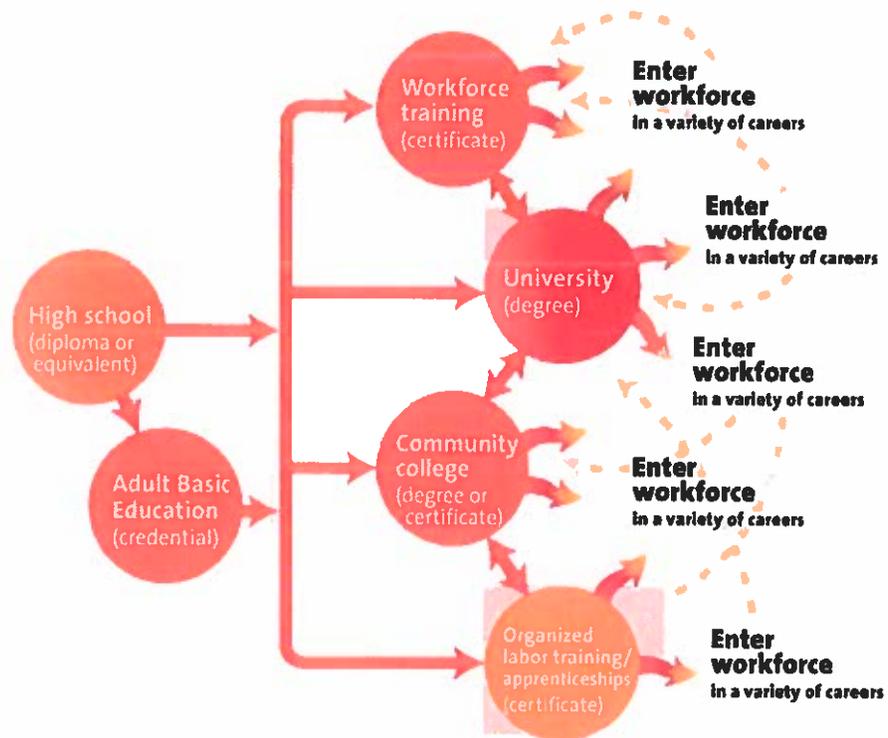
In the **Virginia** Peninsula, a regional Career Pathways initiative is meeting manufacturers' workforce needs by engaging 14 major employers in a consortium, along with the local workforce investment board, the community college and six school districts, among other partners. Through a foundation grant awarded to the Virginia Foundation for Community College Education, the Virginia Peninsula consortium conducts research and development and implements career pathways in manufacturing that are specifically tailored to the more than 11,000 jobs in advanced manufacturing and green technologies that are projected to be available on the peninsula in the next five years.

The consortium conducted a comprehensive, 18-month review of the skill sets needed by its manufacturing partners, published the results, and is now working to align those skill sets with available training and education, from high school through university level, and including apprenticeships and workforce training. A website was developed that matches local education and training options with the skill sets, so that users can quickly see where and how they can gain the skills needed to obtain these emerging jobs.

Mature sector partnerships additionally address the transferability of skills across industry subsectors, thus expanding the potential types of training interventions and their usefulness to employers in related sectors or across the broader industry cluster. Where sector strategies are coming of age they are becoming effective structures for aligning employers in a growing industry cluster or subsector and helping them

Career Pathways

Effective career pathways rely on coordination across education and training programs in order to offer a clear sequence of industry-relevant coursework and credentials to job seekers. Today's education and training programs include online and in-person opportunities.

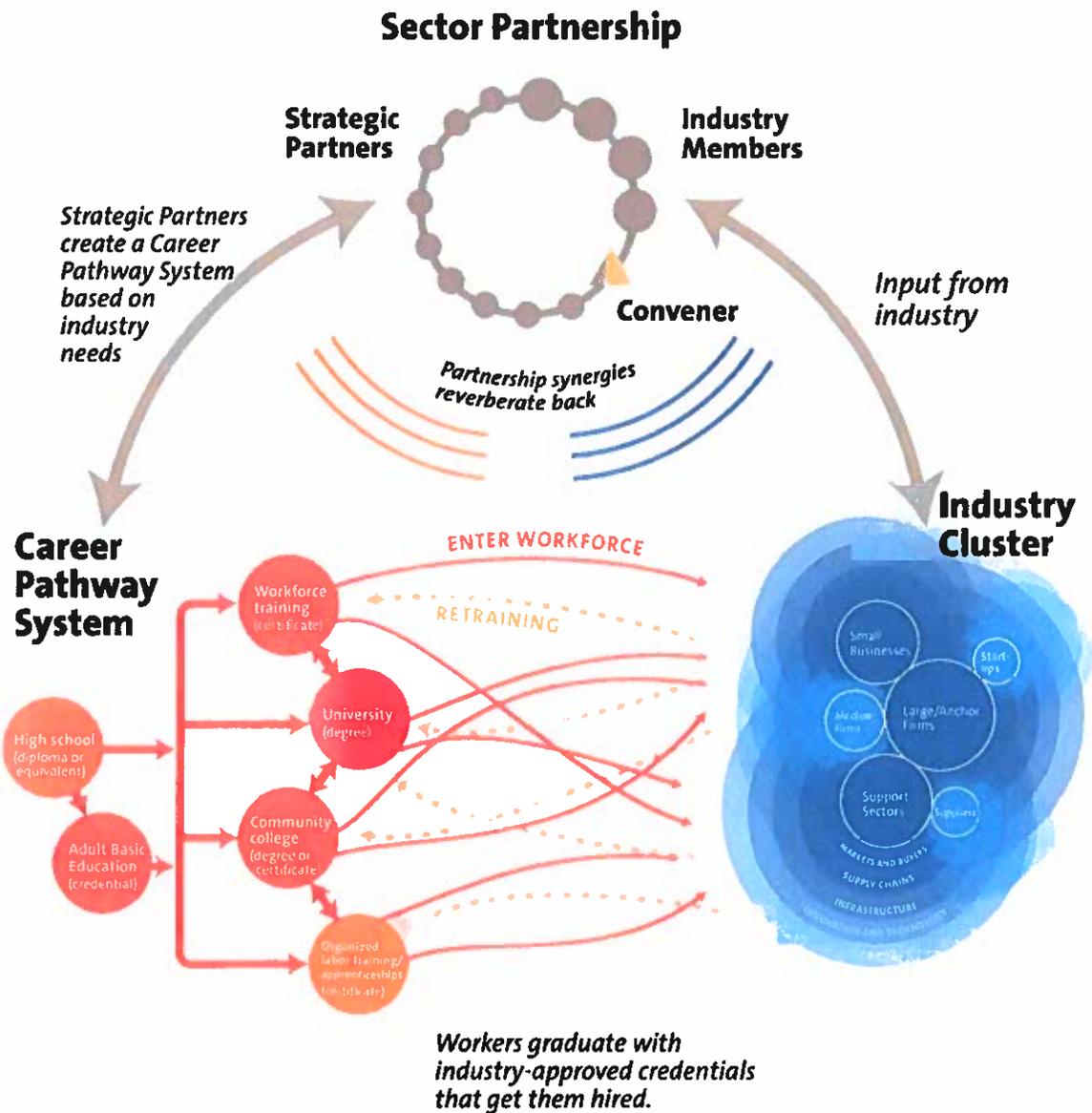


After being in the workforce, a person may choose to go back for more credentials to make an upward or lateral career move.

develop an advanced career pathway. The approach brings together the interests of employers and educators by communicating employer needs to public systems. It provides a coordinator to organize programs into systems that meet those needs. Advanced sector strategies create career pathway systems to meet an industry's workforce needs, and for workers they establish clear paths to good jobs and careers.

Sector Partnerships: The Keystone to Connecting Career Pathways to Industry Cluster Growth

Sector Partnerships align education and training programs with industry needs to produce readily employable workers.



CONCLUSION

Based on more than a decade of knowledge gained, lessons learned, and evidence that sector strategies work, it is clear that they will continue to grow and evolve, especially in states and localities that have already adopted the approach. States are finding sector strategies key to addressing skills gaps, engaging directly with industry and streamlining state programs and resources. No other strategy appears to compare in terms of:

- Using public resources efficiently, effectively, and collectively;
- Showing tangible results, such as improved business productivity and increased earnings for workers; or
- Acknowledging regional differences and strengths and actively encouraging local flexibility and action by local programs.

Governors and regional leaders therefore have good reasons to make sector strategies part of a comprehensive economic competitiveness agenda. Drawing upon the solid efforts of others, states can start immediately with the following steps:

1. Creating a sector strategy committee that includes public and private sector leadership;
2. Aligning state policies across systems, including workforce development, education, and economic development;
3. Cultivating business champions to promote sector strategies across critical industries;
4. Building legislative support to make sector strategies the “way to do business”;
5. Providing good data and industry knowledge to local program leaders;
6. Finding and leveraging funding to support the implementation of sector partnerships, including exploring ways to:
 - Secure funding from state legislatures to broadly support sector strategies;
 - Build policy partnerships among key state agencies that have a stake in the success of specific industries;
 - Embed language and requirements that support sector strategies into all relevant formula programs, grants, and new initiatives;
 - Use sector strategies as a connecting framework across systems and programs when applying for federal or private grants;
 - Explore new uses of revenue sources that could directly support sector strategies; and
 - Approach industry directly to support statewide and local sector strategies;
7. Providing training and capacity building for local programs to design, convene, and implement sector partnerships; and
8. Developing a shared message and tracking outcomes.

Beyond simply replicating the model, however, the real opportunity may lie in how states and local policymakers use sector strategies to integrate with other potentially powerful supply-side and demand-side strategies, specifically career pathway programs and regional industry clusters. It is here that sector strategies can present a tangible strategy for finally integrating the talent agenda with goals of regional economic competitiveness.

Box 4. A Short History of Sector Strategies

The examples of local and state sector strategies provided in this paper represent growing adoption of the sector strategy model as a way to connect education, workforce development, and economic development. But they are part of a longer history. Since the 1980s community-based organizations have used grassroots efforts to connect workers to jobs in local industries, starting what was to become the model for sector partnerships.

Massachusetts began its sector work in 1981 by creating the Bay State Skills Corporation, funding local initiatives across the state in almost every critical industry and requiring 50 percent matching contributions from employers. By the early 2000s other states, such as **Illinois, Michigan, Pennsylvania** and **Washington** were following Massachusetts' lead. By the end in 2010 of a four-year state sector strategy project, conducted by the National Governors Association, Corporation for a Skilled Workforce, and the National Network of Sector Partners, more than 25 states were at various stages of implementing sector strategies and funding local initiatives. Their strategies, including key lessons learned, are catalogued at www.sectorstrategies.org, the most comprehensive clearinghouse for state-level sector strategy information available today.

During the past 10 years, the Department of Labor has funded a succession of initiatives that reflect sector strategy principles, including the Sectoral Demonstration Project, the High Growth Training Initiative, the Community Based Job Training Initiative, WIRED, and most recently American Recovery and Reinvestment Act grants, such as State Energy Sector Partnerships, Energy Training Partnerships, Pathways out of Poverty, and other High Growth and Emerging Industry grants.

Over the same decade, local and national foundations were supporting uptake of the model, best represented by 22 regional workforce funder collaboratives, more than 80 associated workforce partnerships, and 200 funders that are part of the National Fund for Workforce Solutions initiative. Along the way, the National Network of Sector Partners has provided a way for partnerships across the country to connect and learn from each other by serving as their national association.

Several organizations, including the Aspen Institute, Public/Private Ventures, and the Ray Marshall Center for the Study of Human Resources, have evaluated the model's impact on workers and employers.



CSW

Corporation for a
Skilled Workforce

Good Jobs. Thriving Communities.



NATIONAL SKILLS COALITION

Every worker. Every industry. A strong economy

National Governors Association Center for Best Practices
444 N. Capitol Street, Suite 267
Washington, DC 20001
202.624.5300
www.nga.org/center

JANUARY
2019

South Carolina

Sector Partnership Toolkit



TABLE OF CONTENTS

Introduction	1
Why This, Why Now	1
South Carolina’s Vision for a Talent Pipeline	1
How to Use This Toolkit	2
Sector Partnerships: An Overview	3
What’s In It For Me?	4
Career Pathways: An Overview	5
Why are sector partnerships the “home” for career pathway systems-building?	6
What does it take to build industry-driven career pathway systems?	7
Step-by-step Process of Building Industry-Driven Sector Partnerships	7
Step 1: Establish Your Sector Support Team	7
Step 2: Define the scope of industry focus	8
Step 3: Prepare to launch	9
Step 4: Launch	10
Step 5: Move to action	11
Step 6: Sustain and evolve	12
Glossary	13
Attachment A: Job Description of a Sector Partnership Convener	14
Role Summary and Responsibilities	14
What Does a Convener Do?	14
What Does it Take?	15
Roles & Tasks Through the Life Cycle of a Sector Partnership	15
Attachment B: Sample Invitation Letter for Launch Meeting	17
Attachment C: Sample Room setup for Launch Meeting	18
Attachment D: Partnership Launch Agenda	19
Attachment E: Detailed Facilitation Guide- Tips for Facilitation of Sector Partnership Meetings	20
Launch Meeting	20
Calls to Refine Priorities	21
Follow- Up In-Person Meetings	21
Attachment F: Funding Considerations for your Sector Partnership	22
Attachment G: Organizational Shifts	23
Attachment H: Sector Partnerships: Sustainable Staffing and Funding	24

INTRODUCTION

Why This, Why Now

Growing jobs. Increasing prosperity. Expanding opportunity.

Across South Carolina workforce development, education, and economic development systems share a common vision for building a skilled talent pipeline that meets the current and future needs of business and industry and connects South Carolinians to jobs. Now more than ever, we recognize that our ability to stay globally competitive depends on our ability to be finely attuned and responsive to the needs of business, and that will require new levels of collaboration with business and industry.

What does it take to build strong and sustainable partnerships with business and industry? What makes business leaders step up as full partners in building stronger education and training systems? And what does it take to address the comprehensive needs of driving industry sectors, ensuring businesses can grow good jobs and that people are prepared for those jobs? Sector partnerships respond directly to these questions.

Sector partnerships are partnerships of business leaders from the same industry sector in a labor market region, who work together with partners from education, workforce development, and economic development to tackle the common workforce and other competitiveness needs of their industry.

At their best, they serve as:

- A forum for business leaders from the same industry sector to collaborate with their peers in tackling the major issues that impact the overall competitiveness of their industry;
- A single table at which business leaders can access multiple public partners from education, workforce development, and economic development;
- A forum for public partners to gain an accurate, real-time understanding of the needs of the target industry;
- A coordinating body for education, workforce development and economic development partners to align their programs and services with the needs of industry in the targeted sector;
- A “home” for building industry-driven career pathway systems that engage multiple education and training providers in a continuous conversation with industry to ensure that students can build the skills, credentials, and experiences they need to succeed and advance in jobs and careers.

As education, workforce development, and economic development partners are all hearing the same call to action to deepen and strengthen partnerships with business and industry, there is a risk of doubling down and intensifying independent efforts to target and engage with business and industry. Sector partnerships present an alternative approach and an opportunity to work together to build truly sustainable, industry driven partnerships.

South Carolina’s Vision for a Talent Pipeline

The vision for South Carolina’s Talent Pipeline efforts are to cultivate the development of a skilled workforce and a responsive workforce system that meets the needs of business and industry leading to sustainable growth, economic prosperity and global competitiveness for South Carolina.

To achieve this vision a State Leadership Team was formed in 2015 comprised of key executives from the state Department of Education, Department of Commerce, Department of Employment and Workforce, State Technical College System and the Commission for Higher Education, as well as business and industry representatives. Through data analysis, the State Leadership Team identified five high-demand, high-growth sectors: Construction, Diversified Manufacturing, Business and Information Technology, Healthcare, and Transportation and Logistics. Regions were created to spur alignment among workforce and economic development activities at the regional-level.

Building on the foundation of work done to date, South Carolina is focused on forming industry-led sector partnerships in regions across South Carolina. These partnerships will serve as vehicles for aligning programs with the needs of industry sectors that drive regional economies and serve as the basis for building industry-driven career pathway systems. Sector partnerships are fundamentally collaborative efforts and will require the active engagement of partners across South Carolina's workforce development, technical college, higher education and economic development systems to make them a success.

How to Use This Toolkit

This Toolkit is designed for regional sector support teams to jointly plan for, launch, and sustain regional sector partnerships. Regional sector support teams are the backbone to successful industry-led sector partnerships. They include decision-makers from public and community-based organizations in workforce, education, and economic development that interact with or serve the industry of focus. Specifically, regional sector support teams include leaders from:

- Workforce development (i.e., local workforce development areas, business services staff, Workforce Development Board staff and/or members);
- Key economic development leaders (i.e., City- or County-level, Chambers of Commerce);
- Key education program leaders (i.e., K-12 CATE, Community/Technical College leaders, Adult Education, and/or Colleges/Universities);
- Other key regional stakeholders such as community-based organizations.

The Toolkit should be considered a guide and resource to help regional sector support teams work through the step-by-step process of launching and sustaining an industry-led sector partnership. The Toolkit is based on the national Next Generation Sector Partnership toolkit which can be found at www.nextgensectorpartnerships.com. It was developed based on 15 years of lessons learned from sector partnerships across the United States as well as the experience of over 75 active Next Gen Sector Partnerships.¹

While some components of the Toolkit may apply to various kinds of industry engagement efforts, we strongly discourage teams from "cherry picking" elements of the toolkit. Experience from across the country suggests that the design elements described in this Toolkit are essential to building truly sustainable industry-led sector partnerships. While we encourage customization to meet the unique needs of your region, we have found that successful regions adopt the sector partnership approach in its entirety.

¹ - While the general term "Sector Partnerships" is used throughout this toolkit, the model described is the "Next Generation" Sector Partnership model that is distinct from traditional sector partnerships or sectoral training initiatives that are active across the country. For more on the distinctions between "Next Gen" and traditional sector partnerships, visit www.nextgensectorpartnerships.com

SECTOR PARTNERSHIPS: AN OVERVIEW

Sector Partnerships are partnerships of businesses, from the same industry and in a shared labor market region, who work with education, workforce development, economic development and community organizations to address the workforce and other competitiveness needs of the targeted industry.

Sector partnerships center on a critical mass of business leaders from the targeted industry. These business leaders are generally CEOs, COOs or other decision-makers from their company (not generally HR professionals). These business leaders

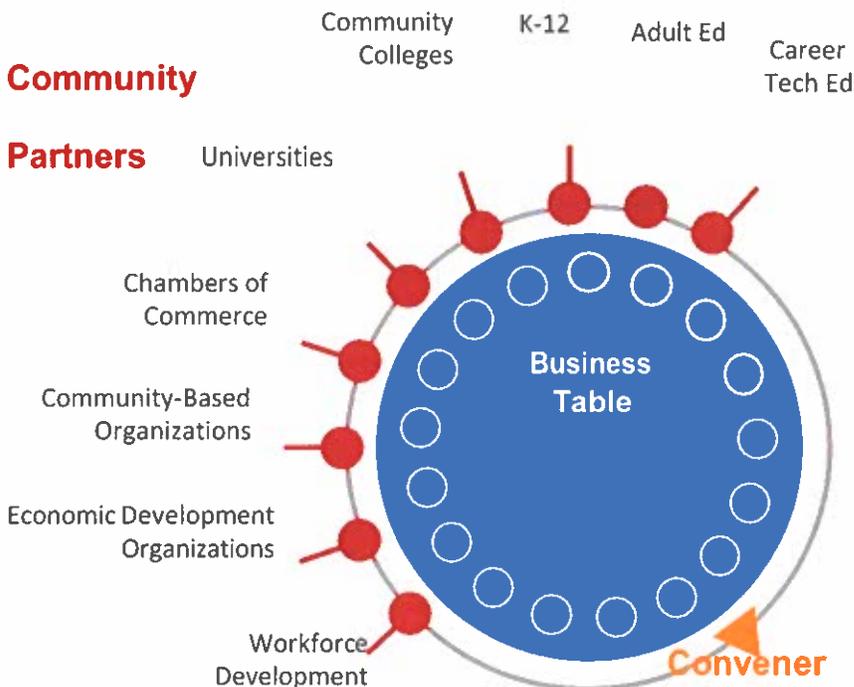
define the agenda, commit to taking action on shared priorities, and hold one another accountable for results.

Supporting those business leaders are a team of community partners representing workforce development, education, and economic development organizations. Rather than each of these partners competing for the time and attention of the same business leaders through independent employer outreach efforts, sector partnerships bring these partners together to create a “shared table” where they jointly collaborate with business leaders in the targeted sector.

This support team literally and figuratively takes a back seat in order to make space

for business leaders to drive. At partnership meetings, they sit on the outside of the room in “listen-only” mode. That doesn’t mean they’re passive. Instead, it means that they give the floor to business leaders to define their own priorities but are poised and ready to help advance those priorities when needed.

A convener provides backbone support to the partnership. The convener is a neutral, third-party who has credibility both with business leaders and with the team of support partners. A partnership may choose to use a single organization as a convener or use a co-convening model where two or more organizations or individuals jointly share the convening role. The convener plays several roles: 1) coordinating meetings and logistics; 2) connecting with business leaders to recruit new members and engaging public partners in playing constructive support roles; 3) communicating partnership progress to both business leaders and partners, and; 4) facilitating meetings to help industry articulate and clarify their action agenda. Learn more in the Step-by-Step Process below and see Attachment A for an in-depth description of the convener role.



DISTINGUISHING CHARACTERISTICS

- Industry-led. Agendas are defined and actively owned by business leaders and focus on common priorities impacting the industry’s ability to grow and thrive, not narrow agendas of public programs.
- Community-supported. Public partners from workforce development, economic development, education and others work together to convene and support Sector Partnerships. Therefore, they act as a coordinating body to ensure there are highly customized and responsive solutions to the industry’s needs.
- Regional. They are organized around the natural labor market region of the targeted industry. This may or may not confirm with jurisdictional boundaries or service areas. Often labor market regions cross county (or even state) lines.

WHAT'S IN IT FOR ME?

Successful sector partnerships offer a clear value proposition for all involved to keep them engaged over time:

For companies:

- A place to come together with other business leaders to address pressing issues related to competitiveness, including talent.
- A single table at which to work with public entities, reducing the number of individual and uncoordinated asks on businesses making it easier for businesses to engage in a meaningful and systematic way.
- An opportunity to share costs related to joint solutions needed across the industry, directly impacting the bottom line.

For educators:

- A venue to continually stay abreast of industry trends and industry needs.
- A go-to spot for partnering with industry to identify, build and continually refine curriculum, programs and credentials that result in career pathway programs.
- A vehicle for creating industry-driven career pathway systems that align education and training programs across multiple institutions with industry needs, creating seamless paths for students and jobseekers to build skills and experience that prepares them for careers.
- Jobseekers and students move seamlessly through and among support programs, educational institutions, training opportunities, and work-based experiences to build skills and credentials that meet industry demand.

For workforce developers:

- A way to strategically focus time and resources toward high impact solutions for industry and workers.
- A way to create highly customized and accurate training solutions for employers that give workers the right training at the right time for the labor market.

For Economic Developers:

- A place for focused work with existing key industries on talent and other questions related to competitiveness.
- A framework for organizing the strategies needed to support critical industries.
- A tool to truly understand the strengths and opportunities of existing industry in a region that can inform retention, growth and attraction strategies.

For all partners, sector partnerships create a productive venue for collaborating with businesses and aligning services and programs to meet the needs of the targeted industry.

How are Sector Partnerships Different?

Sector partnerships are different from traditional industry engagement efforts in several ways:

- **No single organization is in charge.** Sector partnerships are community supported. They require the active engagement of multiple partners in education, workforce development, and economic development but they aren't "owned" by any single organization. Instead, business leaders take ownership over the partnership, with public partners collaborating to play support roles. Does that mean no one's in charge? Not at all. Sector Partnerships require one or two organizations to step up as Convener in order to provide backbone support. And they require a core, committed team of public partners who work together to keep the partnership on track. But credit for successes is shared broadly and, most importantly, business leaders are ultimately the ones who are in charge.

WHAT WORKS WELL (AND NOT SO WELL)

<p>Clusters of companies</p> <p>Employers as partners</p> <p>Industry-driven</p> <p>Regionally-based</p> <p>Existing industry strength or emerging specialty</p> <p>Industry competitiveness/growth</p> <p>Opportunity-focused</p> <p>Employer priorities first</p> <p>Champion-driven</p> <p>Coalitions of the willing</p> <p>People and relationships</p> <p>A disciplined, replicable process</p>	<p>Individual firms</p> <p>Employers as customers</p> <p>System- or institution-driven</p> <p>Statewide top-down or too local</p> <p>Wishful thinking</p> <p>Workforce only</p> <p>Problem-driven</p> <p>Target populations first</p> <p>Representation-oriented</p> <p>The futile search for consensus</p> <p>Organizations and jurisdictions</p> <p>A mysterious, unique occurrence</p>
--	---

- **The agenda is defined and moved forward by industry.** Most industry engagement efforts have a specific and pre-defined agenda: advise on a machining program; provide input on an apprenticeship initiative; develop an advocacy agenda for a statewide association. Sector partnerships, on the other hand, begin with an open-ended question for business leaders, “What are your top priorities for action in making your industry grow and thrive here in this region?” This allows industry to collectively define what matters most. Workforce development is almost always a top priority, but other issues also rise to the top like infrastructure improvements, business-to-business networking, or supply chain issues. Framing the agenda in this way ensures that the partnership stays focused on true priorities for business leaders and, therefore, business engagement is sustained overtime.
- **They are regional.** Sector partnerships follow the natural economic footprint of the targeted industry. Often, this means the labor market region or “labor-shed” and not necessarily geo-political boundaries like counties or workforce areas. This is distinct from state-level associations that tend to focus on state-level issues (i.e. policy/advocacy) or local efforts that are focused on more narrow agendas (i.e. county-based associations).

CAREER PATHWAYS: AN OVERVIEW

Whether you’re in K-12 education, workforce development, or higher education, you may have a slightly different definition of “career pathways.” But no matter where you sit, you will agree that **career pathways are about connecting people to jobs**. So, what does it take?

- **Education and training providers need to have their finger on the pulse of what business needs.** Educators and workforce developers must stay deeply and finely attuned to the needs of the regional labor market. This means they need to have ongoing conversations with businesses about what specific skills and experiences are in-demand. And not just a handful of businesses. To accurately understand what skills are needed, educators need to hear from a critical mass of business leaders that represent the industry as a whole. Labor market data alone is not enough. There is no substitute for real, high-quality and ongoing conversations with business leaders.
- **Students and jobseekers need be able to advance seamlessly through education and training programs.** For decades the “cafeteria style” approach to higher education has emphasized student choice; students have their pick of a range of courses and credits but limited guidance on how to structure a course of study that leads to a credential or career. The problem is that many students get lost along the way, earning credits that don’t add up to a credential with labor market value.²

This problem—too many choices and too little structure—is compounded when you consider the myriad of options every student has for training programs. In every region there are high school career and technical education programs, multiple community and technical colleges, four-year institutions, private training providers, short-term workforce training organizations, and others, all promising a pathway to jobs and careers. With so many options, how do students find the most direct path to a career? How do they navigate their way through multiple institutions without hitting a “dead end,” like credits that won’t transfer or a credential that employers don’t recognize?

Career pathway programs offer part of the solution. By providing a clear sequence of stackable credits and credentials, along with support services, career pathway programs help students advance to higher levels of education and training within a single institution.

² - Bailey, T. R., Smith Jaggars, S., & Jenkins, D. (2015). *Redesigning America’s community colleges: A clearer path to student success*. Cambridge, Massachusetts: Harvard University Press.

A career pathway system builds on career pathway programs, connecting multiple education, training, and service providers to give students and jobseekers a seamless sequence of courses, credits and credentials that lead to jobs and careers. Career pathway systems include: 1) strong advising and support services to help students navigate among and between education and training institutions to find the most direct path to a career; 2) articulation agreements among educational institutions so that credits transfer seamlessly, and; 3) high-quality work-based learning to prepare students with real-world experiences. And, most importantly, career pathway systems are organized around the real needs of business and industry so that students and jobseekers get the right skills to succeed in careers.

A career pathway system aligns education and training programs with the needs of industry, providing clear sequences of stackable credits and credentials across multiple institutions that enable students and jobseekers to advance in careers in the targeted industry. Career pathway systems emerge out of two ongoing conversations: one with employers in the target industry and one with education and training providers who are responsible for developing and implementing programs. Sound familiar? It should. Sector Partnerships are the vehicle for integrating these two conversations.

Career Pathway Program

Connects courses, credits, credentials, support services and work-based experiences within **one** institution

Prepares students and jobseekers for a **single** occupation

Developed **independently** by institutions using program-specific employer advisory groups

Career Pathway System

Connects courses, credits, credentials, support services and work-based experiences across multiple institutions

Prepares students and jobseekers for **multiple** occupations in a targeted industry

Developed collectively by multiple education and training providers in partnership with employers from the targeted industry to **align overall supply and demand of skilled workers** in the targeted industry

What is the difference between a career pathway system and career pathway program?

Career pathway programs help students build industry-relevant skills, certifications and credentials and advance within a single institution. They combine a sequence of stackable credits and credentials with support services to help students successfully advance to higher levels of education and employment in high-demand occupations. A **career pathway system**, on the other hand, is made up of multiple career pathway programs that span multiple educational institutions, workforce and support service partners. These programs are all oriented around a shared understanding of the needs of industry.

Keep in mind that these distinctions are not hard and fast. There are likely examples in your community that fall somewhere in between these definitions of career pathway programs and systems. **The key is to remember that career pathway systems-building is an ongoing, iterative process.** Regardless of where your starting place is, the key questions are:

- How do we ensure our career pathways are grounded in an accurate, real-time understanding of what industry needs?
- How do we ensure education and training providers are coordinated and aligned so that students and jobseekers can seamlessly advance into jobs and careers?

Sector partnerships can help answer both questions.

Why are sector partnerships the “home” for career pathway systems-building?

First, career pathway systems must be grounded in an accurate understanding of what industry needs. That requires sustained employer commitment to ongoing conversations with educators about what skills are in-demand and how best to prepare students and jobseekers with those skills. Sustained employer commitment only happens if you let businesses lead.

Don't make the mistake of asking for employers' time to just talk about their workforce needs or just asking them for input on your programs. Employers have multiple needs and will only stay engaged for the long term if THEY define the agenda. Your sector partnership is an effective and sustainable vehicle to meet employers' multiple needs, including (but not limited to) building a talent pipeline.

Second, career pathway systems require coordination among multiple education and training providers. Since sector partnerships act as the "shared table" where multiple education, workforce development, and community-based organizations work together to respond to industry needs, they are a forum for coordinating across institutions to ensure that, collectively, workforce supply is meeting workforce demand. Sector partnerships engage public partners and industry leaders in a continuous dialogue to ensure that the education and training system is aligned and responsive to industry needs.

What does it take to build industry-driven career pathway systems?

The starting place is building a strong and authentically industry-driven sector partnership. The step-by-step process outlined in this Toolkit is the key foundation for building career pathway systems. Once your sector partnership is established, with business leaders committed and ready to dig in to their collective workforce needs, you will be ready to focus on career pathways.

STEP-BY-STEP PROCESS OF BUILDING INDUSTRY-DRIVEN SECTOR PARTNERSHIPS

STEP 1: ESTABLISH YOUR SECTOR SUPPORT TEAM

Launching a sector partnership often represents a break from tradition. It challenges the status quo, requires a much deeper level of employer engagement, demands a much greater commitment to collaboration, and can deliver remarkable results. It does require that your team commits to a new approach to building partnership with one another and industry. Those who answer the call for a new approach will become the core partners. It will require 1-3 individuals to step up to serve as the partnership convener(s).

Regional Sector Support Team: Consider this the broad network of partners representing key education (including K-12, Career and Technical Education, community and technical colleges), workforce development (workforce development boards, SC Workforce Centers, Department of Social Services, Vocational Rehabilitation, Adult Education, Temporary Assistance to Needy Families, etc.), economic development, and other organizations (could include elected officials, organized labor, community-based organizations) who have a stake in building stronger partnerships with industry. While not all of these partners will play integral roles in the day-to-day operations of your sector partnership, it is important to start by engaging a broad group of partners in making the case for an industry-led sector partnership and see who steps up to play a more active role as a core partner or convener. Your first step is making sure these leaders understand what sector partnerships are and how they're different from (and related to) existing industry engagement efforts. (See "Roles of the Support Team" below for specific roles that partners can play in workforce development, economic development and education).

Core Partners: This is the team that will be directly responsible for launching and supporting the sector partnership. It's important that members of this team represent multiple education, workforce development and economic development organizations. Even more importantly, this team needs to be committed to using the industry-led sector partnership approach. This team will be responsible for brokering relationships with businesses to bring them to—and keep them at—the table. They will also be responsible for identifying partners from the broader regional sector support team that can help implement industry's priorities. This team will also be responsible for making decisions about which organization (or pair of organizations) is best-positioned to serve as convener.

Convener or Co-Convener:

The convener is seen as a neutral third-party who has credibility both with business leaders and with public partners. The convener helps to keep the partnership on track and focused by: 1) coordinating partnership meetings; 2) communicating with both business leaders and public partners, including keeping action-plans up-to-date; 3) connecting with new business leaders to engage them in the partnership and brokering connections with public partners to help with implementation, and; 4) providing facilitation to help business leaders develop and refine their shared agenda for action.



Convener Team: 1-3 individuals who convene, provide backbone support and serve as first responders. Responsible for keeping the partnership on track day-to-day while slowly and selectively bringing in partners and resources to meet business identified and led priorities.

Core Partners: 6-10 select responders who have programs and resources that directly align with industry. Partner closely with core convening team to plug in and coordinate responses.

Regional Sector Support Team: Broad network of community of partners who are in the loop and "on call" to respond. Industry agenda may or may not directly connect with mission of partner organizations.

Questions to Review Before Moving to Step 2

1. Do key stakeholders in our region (from education, workforce development, and economic development) recognize how sector partnership(s) can act as the shared table where they can work with businesses from a targeted sector, understand their needs, and collaborate with other public partners to develop responsive/ coordinated solutions?
2. Are stakeholders willing to identify one target sector to create a shared table approach, vs. operating via multiple independent employer engagement efforts in the targeted sector in our region?
3. Have we agreed on clear roles and responsibilities on the sector support team? Who will participate on the core team? Who is the lead "convener", or convening team?

STEP 2: DEFINE THE SCOPE OF INDUSTRY FOCUS

Once you have pulled together your core convening team, work together to use regional labor market data developed during Phases I and II of the Talent Pipeline Initiative to determine which sectors merit your collective action in launching a sector partnership.

The strongest target sectors are: 1) drivers of your regional economy with a significant number of total jobs, higher-than-average wages, or a rate of concentration in your region that is higher than state or national averages, and 2) the targets of multiple employer engagement efforts in your region. Odds are that if multiple support partners are reaching out to businesses in a given sector, it's a sector that would benefit from a more coordinated approach.

Consider the following criteria when making decisions about what industries to target:

- **Overall employment:** How many jobs does the sector provide in your region? How does this compare to other industries?
- **Average wages:** Does the industry provide family-sustaining wages?
- **Projected growth:** Does the industry show signs of dynamism and growth? Industries that are in decline or contraction tend not to be good candidates for sector partnerships.
- **Industry concentration or location quotient:** Concentration can give indication of specialization in your region's economy. Are there signs of unique competitive advantages or specialization in this sector in your region?

Keep in mind that data only provides one piece of the overall picture about the regional economy and has limitations. **Your on-the-ground knowledge of the regional economy and business trends is equally valuable and important in informing the decision about the industry of choice.**

As you determine the scope of your industry-led partnership, keep in mind the strong benefits of "working definitions." A common pitfall at this early juncture can be paralysis by analysis, where the perfect becomes the enemy of the good. In other words, as you identify the sector or sectors as the focus for your efforts, remember that you are developing a working definition that is always evolving to some degree, especially at the margins. That goes for the specific industry segments that you target, and the geographic scope of your partnership.

Questions to Review before Moving to Step 3

1. Has our core partner team jointly agreed on which industry sectors merit our collective action in launching a sector partnership? Did we use data from Phases I and II, combined with our on-the-ground knowledge about industries, to make these selections? Which sector is first? Or next?
2. Has our core partner team discussed and agreed to the not-too-small, not-too-big geographic footprint for our sector partnership?
3. Has our core partner team informed and looped in the regional sector support team? Leveraged their expertise and relationships?

STEP 3: PREPARE TO LAUNCH

Every industry-led partnership will look and feel different. It will be unique depending on the industry of focus and home region. Regardless, there are tried-and-true actions to taken when preparing to launch a partnership.

ACTION 1: Discuss and agree which one organization, or pair of organizations, is well positioned to be the lead convener/co-convener of the new Partnership. Who has credibility with companies in the target sector? Who can devote some staffing to this effort? Who can neutrally facilitate the partnership's process, leaving their own organizational agendas behind? (For example: Chambers or associations must leave behind goals of increasing membership; colleges must leave behind goals of immediate curriculum advising; workforce development areas must not immediately focus on how to increase performance metrics).

ACTION 2: As a team, confirm that all other partners will be in a strong support role throughout the partnership's life, and that they will be in "listening" mode during meetings with employer partners, and transition to "action" mode once implementation of priority areas and goals begins.

ACTION 3: Start brainstorming and discussing who the companies and CEOs are in your region/ community. Discuss who each support partner knows personally. Make a list and decide which top three CEOs might be best champions for the partnership. Discuss and decide who will do outreach and recruitment for each.

ACTION 4: All partners contribute to a joint list of executive decision-makers from businesses in the region to invite to the partnership launch. Be sure to collect and include personal email addresses on the list where available. The development of this master invitee list takes time, so plan accordingly! Keep in mind that typically about 10-20% of the businesses invited will show up for the launch meeting.

ACTION 5: Decide on the date, time and location. Ask business champions what date and time will work best for companies and suggest that the launch meeting be hosted at one of their facilities, which sends a clear message that this is an industry-owned effort. Now draft an invite and get the business champions to sign it. Get the invitations out with at least 4-6 weeks notice and conduct follow up phone calls to make sure you get the critical mass you want at the Launch. Find a sample invitation in Attachment B.

Make sure your invitation is noticed!

- Send a hard copy invitation signed by business champions
- Utilize email! Distribute the first email invitation and follow it with reminders every 1-2 weeks
- Ask your business champions to send emails directly
- Get it on calendars: send calendar invitations directly to business leaders

Questions to Review Before Moving to Step 4

1. Have we identified and successfully recruited at least one (3 or 4 even better!) CEOs in our region and target industry who will sign the invite letter and welcome everyone to the launch?
2. Have we picked a date, time and location that will work for everyone (ideally locating the meeting at a business facility)?
3. Have we collectively created a list of C-level leaders of companies in our target sector and region to invite to the Launch?
4. Did we get the invite out one month in advance and do we have a plan for appropriate follow ups (i.e. phone calls)?

STEP 4: LAUNCH

There is no one right process to use in the employer launch meeting. However, do spend time on this choice, and choreograph how it will play out. Choose a disciplined process that allows the collective employer voice to emerge, and choose a good facilitator who can pull it out. This first meeting is the hook—employers must see a reason to commit to a next step. Based on years of experience with many different processes, this curriculum offers a set of design criteria and a preferred approach. Whatever approach you choose, it should be designed to have employers identify opportunities for sector growth, priority requirements for capitalizing on these opportunities, and employer champions for those priorities, who are willing to take a next step after the launch meeting. It is essential that by the end of the meeting, there is a shared product (priority opportunities, requirements, and champions) that is the employers'— and

TIPS FOR WORKING WITH INDUSTRY ASSOCIATIONS

Sector partnerships are different from industry associations in a few keyways. First, industry associations tend to be membership-based. Businesses pay membership dues to participate while sector partnerships are open to any business leaders who want to get involved. Second, industry associations tend to have a statewide footprint and focus on a policy/advocacy agenda, versus focusing regionally on practical projects and initiatives that impact the sector locally. However, industry associations can be helpful partners on your “support team.” Consider these tips for building an effective relationship with industry associations:

- Bring them in early to help them understand what sector partnerships are and how they're different. Make sure to be clear about the ways that the sector partnership will work with (vs. compete with) the association.
- Work with industry association staff members to identify key business leaders to get involved in the sector partnership.
- Keep the association staff in the loop as your partnership moves to action, inviting their support on initiatives that align with the association's mission or scope.

not anyone else's--agenda. To this end, it is best if community partners are good listeners during this meeting, giving employers the opportunity to be heard. Carefully review the following attachments:

[Attachment C: Sample Meeting Setup](#)

[Attachment D: Sample Meeting Agenda](#)

[Attachment E: Detailed facilitation guide](#)

Questions to Review Before Moving to Step 5

1. Did we engage a critical mass of business leaders at the launch meeting?
2. Did the launch meeting result in a set of shared priorities that business leaders feel a sense of ownership over?
3. Did employers commit to specific next steps after the meeting?
4. Did we make time for non-industry support partners to debrief after listening at the launch meeting? Did we balance enthusiasm to jump in with solutions with the need to let industry-led task forces further define needs and early wins in the next 2-4 weeks?
5. Are we ready for next steps, sending out an executive summary of the meeting to business members as soon as possible, and setting up short task force calls?

STEP 5: MOVE TO ACTION

The priority opportunities and requirements you identified during the "launch" meeting are a starting place for an action plan: a strategy that lays out a clear set of goals, outcomes, and actions to advance the partnership's shared priorities. To move from ideas to action, the convening team and core partners should work with business leaders to organize focused conversations (either in-person or over the phone) with employer champions who volunteered for each priority area. Focus these smaller groups on defining success (e.g. "What are we trying to achieve? How will we know when we're successful?") and identifying any immediate opportunities for "quick wins" (e.g. "What can we accomplish in the next 60 days that will help advance this priority? How can we get started?").

Pay attention to which employers start to emerge as leaders in these conversations, showing particular passion or helping to focus the group and bring clarity to the discussion. These are the leaders you may want to ask to be lead champions down the road.

There will be a tendency at this point for community partners, with the best of intentions, to take over and drive action, not wanting to impose on the employers. While well-intentioned, this is a formula for failure. If community partners exert themselves too much, employers will begin to step back and disengage. At this critical moment, community partners must give space for the employer's voice to emerge and solidify their engagement as partners, not customers.

Questions to Review Before Moving to Step 6

1. Have we established task teams around employers' priorities? Are task teams primarily made up of employers, with support partners brought in selectively?
2. Have we identified lead employer champions who are taking an active role in transforming ideas into action?
3. Have we achieved clarity around outcomes and strategies in key areas for action?
4. Are support partners beginning to see where they can add value on key priorities? Is there a mechanism to begin engaging them in task team responses, while still ensuring that employers continue to drive the agenda and set strategy?
5. Have we achieved any "quick wins"?
6. Do we have a date set for the next full partnership quarterly meeting?

STEP 6: SUSTAIN AND EVOLVE

Long term success of an industry-driven partnership depends on many factors, but a few rise to the top, including 1) following through on actions, 2) keeping businesses in the driver's seat, 3) continually finding the right staffing and support mix for coordination, and 4) operating in the spirit of continuous improvement.

Let's consider that sustainability of your partnership (and hopefully multiple partnerships) depends on having a shared vision of how multiple systems will operate together, as well as a shared understanding of how to apply and coordinate independent resources into collective impact. The best industry sector partnerships are in fact posterchild examples of how Collective Impact Principles can play out in regional community.

Attachments:

[Attachment F: Funding Considerations](#)

[Attachment G: Organizational Shifts](#)

[Attachment H: Top 5 Tips for Staffing Sector Partnerships](#)

Questions to Review Periodically Throughout Partnership Lifecycle

1. Do key stakeholders involved understand the enduring value of our sector partnership?
 - Companies recognize the sector partnership as a place to address big opportunities for shared competitiveness, a single table at which to work with public entities, and an opportunity to share costs related to needed solutions;
 - Educators recognize the sector partnership as a venue for faster understanding of changing industry needs and a vehicle to build industry-driven career pathway systems;
 - Workforce developers recognize the sector partnership as a way to strategically focus time and resources toward high-impact solutions for industry and workers, a wholesale (vs. retail) approach to serving employers, and a way to create highly customized and therefore highly accurate training solutions for employers;
 - Economic developers recognize the sector partnership as a place for focused work with key industries, a meaningful venue for working with education and workforce development, and a tool to understand the strengths and opportunities of driving industry sectors.
2. Have we considered what organizational home is right for the partnership that ensures that the partnership continues to be industry-driven and action-oriented?
3. Have we developed a process for periodically assessing progress, revising priorities, and refreshing our partnership's agenda?

GLOSSARY

Career Pathway Programs: A career pathway program is a set of stackable credits and credentials, combined with support services, that enables students to secure industry-relevant skills, certifications, and credentials and advance to higher levels of education and employment.

Career Pathway Systems: A career pathway system aligns education and training programs with the needs of industry, providing clear sequences of stackable credits and credentials across multiple institutions that enable students and jobseekers to advance in careers in the targeted industry.

Regional Sector Support Team: Non-industry “support team” of education, workforce, economic development, and other key stakeholders (such as elected officials, organized labor, community-based organizations) who have a stake in building stronger partnerships with the industry sectors and are committed to developing a coordinated response to the needs of industry.

Sector Partnerships: Partnerships of companies, from the same industry and in a shared labor market region, who work with education, workforce development, economic development and community organizations to tackle the shared workforce and broader competitiveness needs of the targeted industry.

Sector Strategies: Actions, policies and strategies that enable support partners (at the state or local level) to directly respond to industry-driven priorities. Sector partnerships are the organizing vehicle to ensure these strategies are effective, via the essential process of understanding demand directly from industry and implementing joint solutions.

Convening Team: Smaller group of the broader sector strategies team responsible for providing backbone support to the sector partnership. This team brings in other partners from the sector support team as industry priorities are identified.

ATTACHMENT A: JOB DESCRIPTION OF A SECTOR PARTNERSHIP CONVENER

ROLE SUMMARY AND RESPONSIBILITIES

The convener plays an essential role in keeping a sector partnership on track and

moving forward to accomplish the goals of the businesses in the partnership. The convener is the backbone of the sector

partnership, providing administrative, project management, and facilitation support to keep the partnership focused and productive. It is essential that the convener is highly action-oriented, but also a collaborative and disciplined team player.

WHAT DOES A CONVENER DO?

Coordinates

- Schedules and sends out announcements about upcoming meetings.
- Arranges logistics of meeting locations (ideally at business locations).
- Arranges planning calls with business

leaders and key support partners to develop agenda and plan for partnership meetings.

- Holds partners accountable to accomplishing tasks within established timeframe.
- Distributes meeting invitations, summaries, and communications in timely fashion.

Communicates

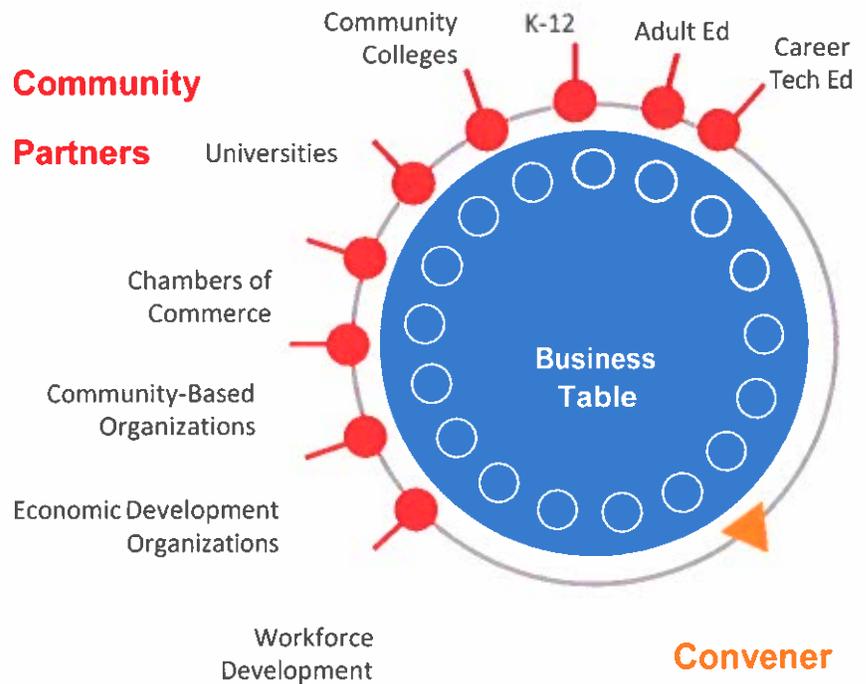
- Serves as the primary point of contact for both business leaders and public partners for the sector partnership, acting as an information hub to connect and network with partnership participants.
- Keeps track of the partnership's written action plan, distributing updates after full partnership or action team meetings.
- Coordinates with other partnership participants to distribute regular updates on partnership activities and progress.

Connects

- Recruits support partners to help advance partnership priorities. In the early stages of a sector partnership, this means identifying the public partners to attend and observe the launch meeting and setting expectations appropriately. Once the partnership has identified priorities for action, it means working with business leaders to pull in and engage additional support partners to help implement partnership priorities. For example, if the partnership is focused on outreach to high schools, the convener would work with partners in local school districts to identify the right points of contact within the targeted high schools.
- Spreads the word about the sector partnership among public partners, encouraging them to actively participate and use the partnership as the "shared table" to collaborate with employers from the targeted sector.

Facilitates

- Strong facilitation is critical in helping business leaders identify common priorities, develop a shared agenda, and translate ideas into action. The convener facilitates partnership meetings without pushing an agenda; their role is to keep meetings productive, focused and on-task.



WHAT DOES IT TAKE?

There is no single organization that is best positioned to convene a sector partnership. Across the country, successful sector partnerships are convened by Workforce Development Boards, Chambers of Commerce, Economic Development Organizations, Industry Associations, or Community Colleges. Many regions also choose to identify two organizations to co-convene the partnership, assigning staff from two organizations to work together to convene a partnership. Whatever the arrangement, it's important that the convener has the following characteristics:

- **Trusted:** The convener must be trusted by businesses and public partners to serve as a neutral convener. They must be willing and fully trusted to set aside organizational interest for the interest of the partnership.
- **Facilitative:** The convener ensures the partnership stays focused and action-oriented, helping the group identify goals and practical steps that can be taken to achieve results. That doesn't mean that the convener pushes an agenda; instead, it means that the convener helps facilitate the group to discern shared priorities and action steps. It's important that the convener is able to strike this balance: supporting the group without directing it, and pushing for action without pushing an agenda.
- **Process-Oriented:** The convener is a champion of the next gen sector partnership model and process. The convener must have a strong enough understanding of the business-driven table that the sector partnership is working to achieve and champion the process to get there. It's particularly helpful if the convener sees their role and the sector partnership as a better way of doing business, rather than a special initiative or project.

ROLES & TASKS THROUGH THE LIFE CYCLE OF A SECTOR PARTNERSHIP

Preparing to Launch:

Role: Ensure that all public partners are committed to the model and actively working towards the launch by recruiting business champions, setting at launch date, sending the invitation, and preparing logistics for the day of.

Tasks:

- Work with other partners to recruit business champions who sign the invitation letter and host the first meeting
- Work with others to build invitation list of business partners as well as public partners
- Establish date and location for launch meeting
- Draft two invitations: one for businesses and one for public partners, both signed by business leaders
- Work with business champions to distribute invitations via email and/or snail mail
- Follow up invitation with calendar invitation
- Work with business champions to send reminder emails
- Encourage business partners to have 1:1 conversations with invitees to encourage them to attend
- Make 1:1 phone calls, spread the word, and gain commitments for attendance
- Ensure the team has materials for launch: sign in sheet, table tents for names, markers, blue sticky wall or post-it notes

Launch:

Role: The convener is the point person for the meeting going off without a "hitch" and also has positioned the public partners to be active listeners prepared to interpret industry priorities and develop responsive solutions as a team.

Tasks:

- Ensure team sets up the room, has printed name tags, facilitation tools in place
- Ensure someone is taking notes
- Facilitate discussion to help the group identify shared opportunities, priorities for action, and make a call for champions.
- Draft summary of launch meeting.

Organizing the Aftermath:

Role: Help the partnership move from ideas to an action plan, forming business-led action teams around each priority area.

Tasks:

- Distribute launch meeting summary within one week
- Work with business leaders to organize first action team conference calls within 2-4 weeks of launch
- Facilitate follow up conference calls and draft updated action plan based on the results. Share draft action plan with business leaders for their feedback.
- Schedule next in-person partnership meeting and work with business champions to identify a location
- Distribute invitations to second in-person meeting to business leaders and public partners.
- Begin to identify public partners that can be helpful in supporting the partnership's priorities.
- Ensure public partners are kept up-to-date on partnership progress by sharing updated action plans.

Sustaining and Evolving:

Role: Provide ongoing project management and administrative support to the partnership, ensuring that action teams are adequately supported with public partners who are actively helping to implement industry priorities and keeping a regular rhythm of partnership meetings (ideally quarterly) and communications.

Tasks:

- Bring in public partners to industry-led action teams to support implementation.
- Keep action plans up-to-date in order to track progress, identify needed support, and communicate successes.
- Regularly schedule action team and full partnership meetings.
- Work with other partners to ensure the partnership has a sustainable support of administrative and staffing support, leveraging and braiding funding as needed.

ATTACHMENT B: SAMPLE INVITATION LETTER FOR LAUNCH MEETING

BUSINESS 1 LOGO

BUSINESS 2 LOGO

HAPPY VALLEY TD & L Partnership

Dear Business Leader,

As leaders in our region's transportation, distribution, and logistics industry we know how rapidly TD&L is growing. We have come together to invite you to join an industry-led, community-supported effort to ensure the continued growth and competitiveness of TDL in the [Happy Valley] region. The launch meeting is scheduled for January 29, 2019 from 8:00-10:00 am. We all face pressing questions and issues every day that impact the growth, potential and competitiveness of the industry. For instance, technology innovations, infrastructure, a qualified workforce, and regulatory hurdles all impact our ability to do business every day and remain competitive.

The meeting will bring together around 30 business leaders, like you, who are senior executives in TD&L businesses and most importantly, strategically and collaboratively minded. Our goal is to walk out of the action-orientated meeting with a set of priority action items that we, as TD&L leaders, can act on together. We hope you can set time aside for this important conversation.

The [DATE] meeting will be a 2-hour commitment, from [time] at [location, ideally place of business]. Please mark your calendar! We realize this is a big ask, but we also think this is a big opportunity. Your participation will be critical to this effort and we encourage you to join us.

RSVPs are requested by [DATE] to [NAME] (EMAIL). If you have any questions, please feel free to contact us or [NAME of PARTNER} at [PHONE] about the partnership.

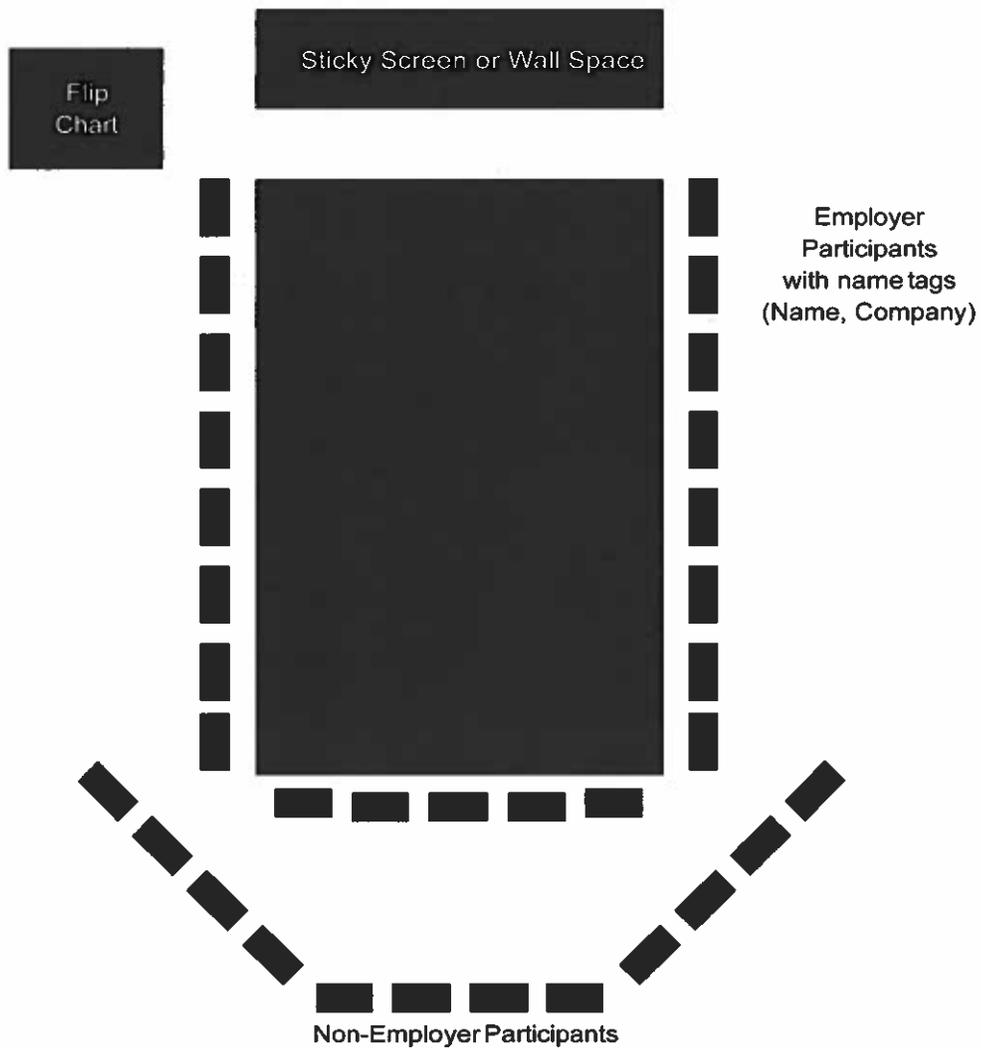
Thank you,

SIGNATURES

Business Champion Name
TITLE
Business

Business Champion Name
TITLE
Business

ATTACHMENT C: SAMPLE ROOM SETUP FOR LAUNCH MEETING



ROOM SETUP

- Employer participants should sit at the big table or at the front or at the center somehow
- All non-employer partners should sit around the employers—this matters.
- The conversation at this meeting is about employers, by them. Public partners are listeners.

MATERIALS

- Colored markers
- 1/2 sheet and full sheets of paper (colored paper works best)
- Flip charts, easels
- Tape on an adhesive to stick papers on wall to display
- Large sticky notes.

ATTACHMENT D: PARTNERSHIP LAUNCH AGENDA

Launching the (insert region) Healthcare Sector Partnership

Date and Time

Location

AGENDA

- 9:00 a.m. *Welcome and Introductions*
Why this, why now, why we invited you here today – Partnership Champions
- 9:20 a.m. *Support Commitments for this Partnership*
We are lucky to have community resources and organizations willing to support the coordination and implementation of this Partnership's priorities – Co-Conveners
- 9:30 a.m. *Identifying and Defining Unique Opportunities*
This will be a facilitated discussion to map out the major changes and opportunities that specifically position the Healthcare industry in our region.
- 10:00 a.m. *Prioritizing Areas for Shared Action*
A facilitated session that defines clear areas for action that will leverage opportunities for shared growth. This will be the early development of this Partnership's action agenda
- 10:40 a.m. *Commitments and Next Steps*
Re-capping priority areas for action and committing to next steps.
- 10:50 a.m. *Final Comments: Co-Chairs and Participants*
- 11:00 a.m. *Thank You and Adjourn*

ATTACHMENT E: DETAILED FACILITATION GUIDE

TIPS FOR FACILITATION OF SECTOR PARTNERSHIP MEETINGS

This tool provides specific, practical guidance for facilitators on how to conduct industry engagement meetings. These are proven techniques, though certainly not the only way to effectively conduct these kind of meetings. Use this exactly, or with changes you think will work best for your facilitation style.

Launch Meeting (allow two hours)

1. **Set up:** sticky wall, u-shape table arrangement, and one large felt pen plus two green, two yellow, two blue 5X8” cards per person
2. **Co-Chair remarks:** should talk about why they think it is important for the industry to come together around its own priorities before working with community partners, why they are personally passionate about the potential for the industry, and how they expect this effort to produce action. (15 minutes, including self-introductions and any other opening remarks)
3. **Opportunities discussion:** what are the biggest opportunities to grow this industry in our region, what could drive growth in the next few years? For example—these are prompts pre-made on cards—it could be growing markets, new products, new technologies/processes, policy changes, or other. Start with an opportunity-driven growth agenda, not a listing of problems or issues—and do not constrain their agenda at the beginning (i.e., don't ask them what their workforce needs are). (5 minutes)

Ask participants to write with the felt pen on the green cards their top two opportunities—noting that they could fall into one of the categories above or something else. Ask them to write just a few words (5 or so) to capture the essence of their idea, one idea per card, and to put their name at the bottom of the card. Tell them to raise their cards when done. Gather cards and group them on the sticky wall. Briefly characterize the results, and call on individuals to elaborate on their ideas. During the discussion, write on and post cards to capture additional ideas. Conclude by noting the great potential to grow this industry in the region (30 minutes)

4. **Requirements discussion:** What is going to be required to capitalize on these opportunities? What are the top requirements, that business and community partners need to make sure are in place, to unlock the potential growth of this industry in our region? For example—these are prompts pre-made on cards—it could be talent, infrastructure, image/marketing, business-to-business partnering, regulatory/permitting, export promotion, or other. Emphasize here that we should focus specifically on requirements that we can impact here locally, so we can take action. (5 minutes)

Ask participants to write with the felt pen on the yellow cards their top two opportunities—noting that they could fall into one of the categories above or something else. Ask them to write just a few words (5 or so) to capture the essence of their idea, one idea per card, and to put their name at the bottom of the card. Tell them to raise their cards when done. Gather cards and group them on the sticky wall. Briefly characterize the results, and call on individuals to elaborate on their ideas. During the discussion, write on and add cards to post cards to capture additional ideas. Keep condensing and reorganizing the groups of cards, constantly checking in with the group, aiming for 2-3 priorities if possible—do not encourage agenda explosion into dozens of priorities. Conclude by summarizing the top priorities (45 minutes)

5. **Call for champions:** Remind participants that this is about action and is champion-driven. If no one wants to personally help champion a priority, it is not a priority—and will be taken off the board. What does it mean to be a champion?

At this stage, it means to help refine the priority area for action, to help define what success looks like and what actions could advance the priority. We will hold conference calls to define outcomes and actions for these priorities, then reconvene as a full group to discuss and refine those priorities—the steps necessary to move to an action plan. Ultimately, when you as industry champions feel that you have sufficient clarity on desired outcomes and actions, we will sync up community partners to help get the job done. (5 minutes)

Ask participants to write with a felt pen on blue cards their name and the priority they wish to champion (they can champion more than one priority, which is why you give them two cards), and raise their card when ready. You will want to brief your co-chairs before the meeting that this is coming so that they can lead by example, filling out their cards. Make a big deal of people who sign their cards as champions, which will encourage others to join the team! When giving the instructions, ask them also to list one or more business people that they would recommend join our team—knowing now the priorities on which we are focusing. People like them—who care about their industry and the community (civic entrepreneurs), and are people that they would want to have on their “dream team” if they wanted to get something done. If everyone adds one name, you have potentially doubled the size of the group in a high-quality way. (10 minutes)

6. **Concluding comments:** remind people that there will be follow-up conference calls to flesh out the priorities for action within 30 days, and a follow-up meeting within 60 days. A summary of this meeting will be back out within a week. Co-Chairs give their final remarks, congratulating the group and sharing their optimism and enthusiasm for the next steps. (5 minutes)

Conference Calls to Refine Priorities (30-60 minutes)

1. After launch meetings, many partnerships conduct follow-up conference calls. These can be calls, or calls with a central meeting place for those who can meet face-to-face. There are two parts: first, what does success look like (i.e., tangible outcomes), and given that definition of success, what actions are required? The goal is to get greater clarity on key outcomes and actions that can be carried over for further refinement at the next face-to-face meeting. Summarize results and get it back out to champions for comment.

Follow-Up In-Person Meeting(s) (two hours)

1. This part of the process can typically take 1-2 sessions for industry to get sufficient clarity and ownership of each priority to agree to moving to an action plan with the help of community partners. Remember there will be some new participants at the second meeting (those who could not make the first meeting, those whose names were identified by those who attended the first meeting).
2. Based on the conference calls, pre-write the top outcomes and actions for each priority and post them on the sticky wall. Review the items and ask for comments and refinements, capturing them on cards and posting them. (Also put out piles of cards and pens on the tables if someone wants to fill out a card, and for later when you ask for champions again). Storyboard a series of action steps, asking the group to focus particularly on necessary first steps (“early wins”) and how those lead to next steps, etc. Constantly “recap, check-in, and refine” the storyboard, getting the group to “own” the results. Move to the next priority, and repeat the process. At the end of the meeting, summarize and ask for champions again. At this point, divide into “action teams” to further refine the outcomes and actions, and to identify implementation commitments.
3. Work with your co-chairs to make the following decisions: Who should lead each action team? When is it time to bring in community partners, and who would those people be? This is a critical step and one that has to be done carefully, as we want to keep industry champions in the lead, supported by community partners. A common pitfall at this stage is that community partners will take over and industry champions will pull back. Instead, the focus has to be on defining *complementary roles* that industry and community partners must play to move forward.

ATTACHMENT F: FUNDING CONSIDERATIONS FOR YOUR SECTOR PARTNERSHIP

Ongoing Support and Planning

Growth and Implementation of Partnership Solutions

		What do others use?	What do others use?
Actual \$ Financial Support		Federal grants State grants County or city grants Foundation grants Fee for service Employer contributions	
		WIOA formula funds: Title I core & intensive; Title I On-the-Job-training; Title I training funds; Title II Adult education Other Federal funds State funds City/County funds Foundation grants Corporate giving grants Employer contributions Fee for service	
In-kind Support Staff time, other support		Employers' time, meeting space Public Partner Staff time to help coordinate, set up meetings, agendas, minutes, outreach, follow through, strategy development Got multiple partnerships? Share the workload of coordination across public partners.	
		Employers' time, meeting space, equipment, trainings, expertise, marketing, etc. Public partner staff time; re- purposed staff time to formally lead/ coordinate	

ATTACHMENT G: ORGANIZATIONAL SHIFTS

ORGANIZATIONAL SHIFTS TO SUSTAIN SECTOR PARTNERSHIPS

Examples of how various types of organizations have shifted their mission to support sector partnerships.

WIBs/Workforce	Economic Development	Community Colleges/ Education	New Organizations	Cities or Counties
<p>Blends, braids and leverages internal and external funding streams to increase flexibility</p> <p>Partners closely with economic development and clarify roles/ responsibilities, increasing authority to respond to real business needs</p> <p>Uses the WDB to institute a policy of using sector partnerships as organizing mechanism to serve critical clusters</p> <p>Repurposes business services staff to coordinate individual sector partnerships</p> <p>Other:</p>	<p>Shifts the business model to orient around critical clusters, bringing focus to business operations</p> <p>Dedicates staff persons to each critical cluster</p> <p>Blends, braids and leverages internal and external funding streams to increase flexibility</p> <p>Other:</p>	<p>Offers testing lab, incubator, and research facilities as part of partnership's service menu (potentially offering fee-for- service testing labs)</p> <p>Keeps any university agenda separate from partnership</p> <p>Creates an arm's-length Foundation to support partnership</p> <p>Blends, braids and leverages internal and external funding streams to increase flexibility</p> <p>Ensures communication between advisory boards and sector partnership</p> <p>Dedicates staff to supporting and convening partnership</p> <p>Other:</p>	<p>Business supported (via dues-paying membership or fee-for-service)</p> <p>Partners with public program to help staff the partnership</p> <p>Blends, braids and leverages internal and external funding streams to increase flexibility</p> <p>Other:</p>	<p>Uses influence of Mayor's Office to bring programs together to co-convene</p> <p>Blends and braids multiple public funding sources to support partnership</p> <p>Dedicates staff to supporting and convening partnership</p> <p>Other:</p>

ATTACHMENT H : SECTOR PARTNERSHIPS: SUSTAINABLE STAFFING AND FUNDING

This attachment is intended to spur new ideas about how to sustainably staff your sector partnerships. View this tool as a *top 5 of models* to consider from sector partnerships around the country.

Why Sustained Staffing Matters

Sector partnerships require both a philosophical and a practical approach to sustainable staffing. The philosophical one requires that the convening and partner organizations choose to be involved in improving their region's overall economic competitiveness, not just focused on the priorities of individual organizations or programs. Organizations leading sector partnership efforts are quickly learning that there are major advantages to collaboration on regional industry efforts and that if they don't collaborate, they will be left to go it alone in an increasingly competitive and resource-strained environment. For workforce development boards, economic development boards and education systems, this means proactively demonstrating their unique value-add and credibility in the context of aggressive collaboration and alignment. *If an organization chooses this philosophy, there are number of ways to practically resource sector partnerships.*

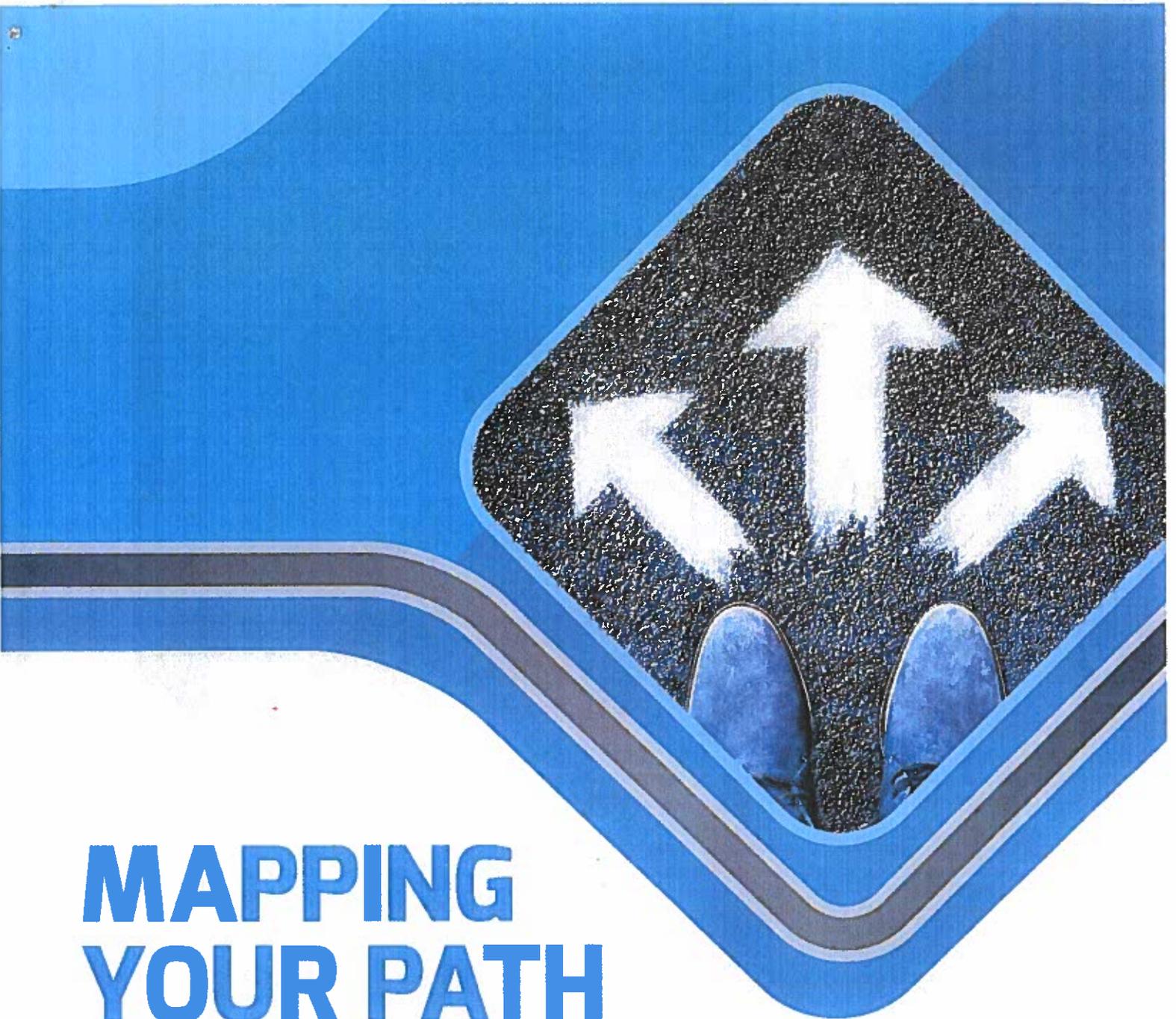
Five Approaches to Consider:

- 1. Start at the Top:** Your organization's director, leadership team and high-level managers must be on board and involved with the decision-making to dedicate staff to the needed project management, relationship building, and follow-through of a partnership. In fact, they themselves are often well suited to actually help staff a partnership. They often have more flexibility in how their time is spent and can justify spending time on needed capacity building that will help build the partnership.
- 2. Use the Law to your Advantage:** Sector partnerships are one model of sector partnerships or sector strategies. Your local WIOA plan should therefore authorize and support the development of your sector partnerships. WIOA funding can be used to support labor market analysis, planning and organizing local/regional activities (i.e. sector partnership activities), business service strategies, and training solutions associated with your sector partnership work. Help your board see the policy connections to this work that it gets credibility and blessing to move forward.
- 3. Think of this as a Different Way to Work, not More Work:** The best sector partnerships succeed because their conveners and support partners operate on an assumption that they will get more bang for their public dollar buck if they coordinate together to engage with their most critical industry sectors, and then in response coordinate to ensure that industry and jobseekers in the community get what they need. This is the same concept as coordinated business service teams at the workforce center level. If your region is already convening business service teams among WIOA core partners, or hopefully with college and economic development partners too, make sure this is not done in isolation of your sector partnership. How can you structure your coordinated business outreach efforts to directly link to and support your sector partnership? What is the line of communication? Can you consider re-purposing Business service outreach staff to recruit, engage and help staff the employer relationships of the sector partnership?
- 4. Reduce your Costs by Pooling, Blending and Braiding:** Every organization should be accustomed to leveraging funding for projects and programs. It's no different when funding the critical role of staffing a sector partnership. There are many variations on this theme.
 - In Pennsylvania, regions leverage WIOA funds like Rapid Response dollars, Adult/Dislocated/Youth funds, and incumbent worker training funds to support their partnerships.
 - In Eugene, Oregon, the Lane County Tech Collaborative is staffed by an employee of the statewide Technology Association who is locally based, and collaborates intensively with the local workforce board, colleges and economic development entities. Their Food & Beverage Partnership lead staff person is a shared position paid for by the Workforce Development Board, the County, the City of Eugene, Eugene Chamber and the local utility board.
 - In Phoenix, Arizona sector partnerships are spearheaded out of the Greater Phoenix Chamber where they leverage private corporate and public funding with their annual Phoenix Forward economic development fundraising campaign.

- In Brownsville, Texas the South Texas Healthcare Partnership dedicates staff time from one of their local colleges to coordinate the partnership, and regularly leverages industry facilities for meetings and philanthropic funding for program responses.
- In the East Bay of California, their manufacturing partnership recently merged with an existing regional manufacturing consortium that brings philanthropic funding and corporate grants to the table.

In all cases, the key is authentic partnering across diverse organizations to ensure multiple and flexible funding and staff functions are leveraged.

5. **Don't Rule Out Staffing from the Industry Side:** Across the country the most advanced partnerships make direct use of staff from industry members of their partnership. For example, a Next Gen manufacturing sector partnership in Kingman, Arizona (KAMMA) is organized and coordinated by a staff member of one of their leading companies, Laron Manufacturing. The workforce development board, local economic development agency and college are key support partners. The Northern Colorado (NoCO) Manufacturing partnership in the Ft. Collins area relies on company leaders to chair their committees, but also leans on them to provide staff to help lead and coordinate actual committee activities.



MAPPING YOUR PATH

The Career Pathways Project

Charleston Metro
Chamber of Commerce 

 **CAEL**
Linking Learning and Work

ABOUT THE CAREER PATHWAYS PROJECT

The Charleston Metro Chamber of Commerce (CMCC) and the Council for Adult and Experiential Learning (CAEL), with financial support from the Wells Fargo Foundation, have partnered to provide the first in a multi-phase project designed to declutter the career pathway landscape for high school students and early-career workers. Mapping Your Path will be the first phase of the Career Pathways Project. It will act as a personal GPS system helping students and adults find their way to gainful employment and a successful career. Designed to be deployed in our region's K-12 schools, technical colleges and throughout the community, these pathways will be another powerful tool in Charleston's arsenal illuminating pathways to better jobs and wages through training and education. The pathways selected represent high-growth occupational clusters for the region. Skills required in each pathway are adapted from CMCC's *Common Skills in High Demand* and each pathway's validity has been endorsed by the employers referenced in each sector pathway.

ABOUT CAEL

CAEL is a national non-profit organization, headquartered in Chicago, that links learning and work. CAEL's workforce and economic development endeavors are grounded in the belief that economic prosperity and inclusive growth occurs when the full range of community members have opportunity and access to learning and meaningful employment, when employers can expand unencumbered by the availability of talent; and when the public education and workforce development systems are proactive and additive to the efforts of both.

ABOUT THE CHARLESTON METRO CHAMBER OF COMMERCE

With approximately 1,600 member organizations representing 160,000 professionals, the Charleston Metro Chamber of Commerce serves as the collective voice of the tri-county business community, and a catalyst for regional economic advancement and member success.

In partnership with:



This report has been funded through a grant provided by:



MAPPING YOUR PATH

Discover the best in-demand careers in the Charleston Region

The news is full of announcements about the new jobs coming to Charleston. But knowing how to find those jobs, and where to get the education and training you need for them can be confusing.

Mapping Your Path is a planning tool that will help you understand the best pathways to build the career you want in the Charleston area. Explore the pathways shared here to learn which jobs require shorter or longer education programs, to know what skills you will need, and to have an idea how of much you can expect to earn.

Take a look inside, explore the industry fields that most interest you and begin mapping your career pathway.



HEALTHCARE OCCUPATIONS

WHAT CAN I DO NOW?

- ☑ Volunteer for the TFACH or GOLD program at Trident Health.
- ☑ Volunteer at East Cooper Medical Center during the summer.
- ☑ Do a Scrubs University session at Roper St. Francis.
- ☑ Attend Discover MUSC Day or volunteer as a Candy Stripper.
- ☑ Make a Tallo profile and build it over time.

DO IT QUICK!



You can earn a Continuing Ed certification in Coding Specialist, Medical Office Specialist, Pharmacy Technician, Medical Lab Assistant, Phlebotomist - some just 5 weeks long.

GENERAL DEMAND FOR HEALTHCARE OCCUPATIONS:

Over the next 5 years we need this many more health professionals in our community:

- > **2,300** more Nurses, Health Aides, and Therapists
- > **600** Medical Technicians
- > **400** Medical Operations/ Office Professionals
- > **300** Physicians/Practitioners

DO YOU KNOW?



Many employers provide tuition support or tuition reimbursement toward certification or degrees relevant to your job.

WHAT IF I AM INTERESTED IN HEALTH BUT DO NOT WANT TO WORK WITH PATIENTS?



Health Informatics is for you. Workers involved in all aspects of managing health care agencies, patient data and information, financial information and computer applications related to health care. You can also work for a pharmaceutical or medical device manufacturer. Salary range \$40,000 to \$91,000.

"SC will have the 4th worst nursing shortage in the country by 2030" - *The Post and Courier*

MASTERS'S DEGREE

Medical University of South Carolina, Charleston Southern University

\$67K-\$100K+ 48 to 60 months

Physician Assistant
Pharmacist
Nurse Practitioner
Health Administrator



BACHELOR'S DEGREE

ECPI, Citadel, Charleston Southern, College of Charleston

\$52K-\$67K+ 48 to 60 months

Registered Nurse (BSN)
Health Info Tech or Hospital Administrator
Clinical Pharmacist or Pharmacist
Medical Practice Manager



MASTER'S AND BEYOND

ECPI, Medical University of South Carolina, Charleston Southern University

\$100K+ 24 to 36 months

Physician, Surgeon, Dentist, PharmD
Doctor of Health Administrator
Doctor of Nurse Anesthesia

ASSOCIATE'S DEGREE

Trident Technical College

\$30K - \$55K+ 24 to 36 months

Paramedic
Nursing (ADN)
Pharmacy Technician
Health Information Tech
Registered Nurse (RN)



CERTIFICATIONS

Trident Technical College, ECPI, Southeastern Institute

6 to 24 months \$25K-\$37K+

Emergency Medical Technician
Advanced EMT
Paramedic

Licensed Practical Nurse (LPN) or Licensed
Medical Office Assistant (LMA) or
Certified Medical Assistant (CMA),
Coding or Claims Processor

HIGH SCHOOL DIPLOMA

Health Science Career Academies in BCSD, DOD and CCSD

4 years \$20K-\$28K+

Home Health Aide
Personal Care Aide
Medical Office Specialist

YOUTH APPRENTICESHIP

Charleston Regional Youth Apprenticeships at Trident Technical College

2 years



E.M.T. (Emergency Medical Technician)
Medical Office Assistant
C.N.A. (Certificate Nursing Assistant) to Pre-Nursing

SKILLS NEEDED

- ☑ **Communication/Listening Skills**
 - Active listening that includes body language and eye contact.
 - Verbal and written skills which include the ability to carry on conversations, speak clearly and concisely and use proper grammar and punctuation.
 - Ability to determine best mode of communication.
- ☑ **Customer Service Skills**
 - The Customer comes first. Everyone is a customer including internal co-workers.
 - Be aware of your tone of voice and how you approach different people.
 - Ability to be empathetic and compassionate.
- ☑ **Detail Oriented Skills**
 - Knowledge of office software, ability to multitask.
 - Stick to deadlines and react quickly.
 - Must be able to follow directions. It is vital that communication is proofed carefully, it can mean life or death.
- ☑ **Math Skills**
 - Ability to perform basic math operations, percentages, conversion, and use of a calculator.
- ☑ **Basic Non-Negotiables**
 - Be honest and dependable. Arriving on time means arriving 15 minutes early.
 - Remember all new employees must pass a drug test and some companies will not hire you if you have a criminal record.

WITH GUIDANCE FROM THE FOLLOWING LOCAL EMPLOYERS



CONSTRUCTION OCCUPATIONS

WHAT CAN I DO NOW?

- ☑ Participates in hands on activities like Build A Shed.
- ☑ Ask Construction companies for a job shadow or summer internship. Be willing to do the grunt work in order to gain entry to the field.
- ☑ Teach yourself to read blueprints.
- ☑ Build a Tallo profile and add to it over time.
- ☑ Do several job shadows - every experience teaches you something.

TALENT DEMAND

2016 Talent Demand Study says 1,100 new construction jobs will be created locally over the next five years (2017-2022)

400+ There are 400+ construction job openings in the Charleston Metro Area region daily.

DO IT QUICK!

 You can earn a Continuing Ed certification in Construction Craft Laborer, Licensed Electrical Contractor, OSHA Construction Industry Safety, Supervisory Skills for Construction- some just 5 weeks long.

WHAT IF I DON'T LIKE TO BE OUTSIDE?

Construction companies need Human Resources, Accounting, IT and Project Management positions that are done in an air-conditioned office.

SKILLS NEEDED

- 🗨 **Communication/Listening Skills**
 - Good eye contact conveys confidence to the customer, listening skills are required to follow directions.
 - Verbal skills and written skills require correct grammar in order to write reports, convey information and identify safety hazards.
 - Must be able to work on a team with various cultures.
- 📐 **Detail Oriented Skills**
 - Attention to read safety guidelines, training details and procedures for equipment operation.
 - Ability to read and understand plans, blueprints, and instructional manuals.
- 📐 **Math Skills**
 - Knowledge of geometry concepts, working to scale, relating point A to point B, ability to use a tape measure and determine the square distance across a surface.
 - Knowledge of conversions and working with fractions gives a competitive edge, ability to use a calculator required.
- ⚙ **Mechanical Skills**
 - Ability to operate power equipment, electrical systems, change batteries and blades.
 - Conduct pre-check maintenance as an everyday routine.
- 📋 **Basic Non-Negotiables**
 - Must have a can-do attitude and be on-time every day you are scheduled.
 - Remember you must be able to pass a drug test and a good driving record is a plus.

HIGH SCHOOL DIPLOMA

Career Academies in BCSO, DD2 and CCSD

📅 4 years 💰 \$25K-534K+



Welder helper (WITH 2 YEARS OF CTE WELDING CLASSES)
HVAC or plumber helper
Field Engineer Helper
Field Engineer
Painter
Concrete finisher

CERTIFICATIONS

Trident Technical College

💰 \$30K-580K+ 📅 6-24 months

CAD Drafter
Electrician
Mason
Welder/Iron worker
Construction Mgr
Boiler maker
Millwright
Instrumentation Tech
Equipment/Crane operator
Electric Line Worker

YOUTH APPRENTICESHIP

Charleston Regional Youth Apprenticeships at Trident Technical College

📅 24 months

YA HVAC
YA-Civil CAD Tech
YA-Engineering
YA-Engineering Tech

BACHELOR'S DEGREE

ECPI, Citadel, Charleston Southern, University

💰 \$45K-80K+ 📅 48 to 60 months

Construction Manager
Engineering Manager
Construction Project Manager
Business Developer
Operations Director
Civil Engineer
Construction Co Management
Preconstruction Director

This industry often employs bonuses of 5-25% of salary.

All some construction companies you can get promotions based on experience alone, without the Assoc Degree

ASSOCIATE'S DEGREE

ECPI, Trident Technical College

💰 \$35K-60K+ 📅 24 to 36 months

Architectural and Civil Drafters
Construction Administer
Welding Inspector
Estimator
Scheduling Mgr
Marketing Mgr
Virtual Construction Mgr
Preconstruction Mgr

WITH GUIDANCE FROM THE FOLLOWING LOCAL EMPLOYERS



Reputation is Everything



Thompson

CULINARY/HOSPITALITY OCCUPATIONS

WHAT CAN I DO NOW?

- ☑ Be curious, learn to research.
- ☑ Get a summer job in food service.
- ☑ Find out if your high school has culinary classes.
- ☑ Do several job shadows - every experience teaches you something.
- ☑ Volunteer in a food bank or for non profits involved in meal prep service.
- ☑ Build a Tallo profile and add to it over time.

TALENT DEMAND

1,200+

There are 1,200+ culinary and hotel/convention job openings in the Charleston Metro Area.

2018 Talent Demand Study says 3,661 new jobs will be created locally over the next five years (2017 - 2022).

DO IT QUICK!



You can earn a Continuing Ed Certification in Culinary Arts of Baking and Pastry in just 8 weeks.

HIGH SCHOOL DIPLOMA

Culinary Career Academies in
BCSD, DD2 and CCSD

4 years \$19K-\$29K+

Host/Server
Guest Services Coordinator/Front Desk
Housekeeping Attendant

CERTIFICATIONS

Trident Technical College

6 to 24 months \$25K-\$37K+



Pastry Cook III or Prep Cook
Lead front desk agent/
Concierge
Housekeeping Supervisor

YOUTH APPRENTICESHIP

Charleston Regional Youth Apprenticeships
at Trident Technical College

2 years

YA -Culinary Arts
YA-Hotel Operations

BACHELOR'S DEGREE

College of Charleston

\$39K-\$60K+ 48 to 60 months

Executive Chef
Director of Front office
Event Planner
Resort Manager

ASSOCIATE'S DEGREE

Trident Technical College

\$30K-\$50K+ 24 to 36 months

Pastry Cook II or Line Cook II
Front Desk Supervisor
Asst Housekeeping Mgr
Housekeeping Manager

SKILLS NEEDED

- ☑ **Communication/Listening Skills**
 - Active listening that includes body language and eye contact.
 - Verbal and written skills that always include proper grammar and punctuation.
- ☑ **Customer Service Skills**
 - Exude hospitality and confidence with a smile.
 - Ability to read a person's body language and genuinely care about serving them.
- ☑ **Detail Oriented Skills**
 - Dress for success. Uniforms should always be clean, ironed, tucked in. Look like a professional.
 - Be one step ahead. Plan for transportation, childcare, traffic and parking.
 - Ability to understand and manage personal finances is a sign of competency and maturity.
- ☑ **Problem Solving/Analytical Skills**
 - Be solution oriented and take ownership of problems. Be the best member of your team.
 - Be accountable, know your resources and the right person to help resolve the issue.
- ☑ **Basic Non-Negotiables**
 - Show up for every shift. Arriving on time means arriving a little early.
 - A positive can-do attitude is your most valuable skill.
 - Remember that employees must pass a drug test and some companies will not hire you if you have a criminal record.

WITH GUIDANCE FROM THE FOLLOWING LOCAL EMPLOYERS



IT/TECHNOLOGY OCCUPATIONS

WHAT CAN I DO NOW?

- ☑ Take computer science classes at your school.
- ☑ Teach yourself - check out SCCodes.org.
- ☑ Take a CGDEcamp class at the Charleston Digital Corridor.
- ☑ Make a Tallo profile and add to it over time.
- ☑ Go to Charlestonwomenintech.com and attend a CodeON class.

DO IT QUICK!



You can also earn a Continuing Ed certification from Trident Technical College in Java and Web Design.

TALENT DEMAND

Jobs in highest demand are Computer Systems Analysts and Software Developers

600

There are about 600 Software and IT job openings in the region everyday

DID YOU KNOW?



IT is an industry that heavily favors experience and certifications. A four year degree is not always required, it is also an industry that rewards lifelong self-learners.

DIG DEEPER

- ☑ Do you have an active GitHub or StackOverflow profile that showcases open source contributions or projects?
- ☑ Do you publish a blog or publish on online course forums like Udemy or pluralsight?
- ☑ Valuable Certifications: CISSP for Cyber Jobs; CISM, CCSK, CCSP, CCNP, CCDE, CCIE Security or GIAC, ITIL for Infrastructure and any Cisco certifications, AWS and Azure certifications.

SKILLS NEEDED

- 🗨 **Communication/Listening Skills**
 - Written skills for web developers require proper grammar, use of basic professional language, correct terminology and attention to detail in order to assure the technicalities of the websites work properly.
 - Ability to work on a team is essential. Must be able to communicate, collaborate, take constructive criticism maturely.
- 👤 **Customer Service Skills**
 - Verbal skills for customer service and support positions require an awareness of tone and manner, proper grammar and use of 'business language' in a professional atmosphere.
- 📅 **Detail Oriented Skills**
 - Deadlines matter. Proof and test your work.
 - Be punctual, reliable and ready to work. Always be working to improve your time management skills.
- 🔍 **Problem Solving/Analytical Skills**
 - Must be able to identify the problem in order to find the resources to fix it. In the IT world problem solving is highly valued.
 - Must be able to draw on all the resources you know, use critical thinking skills and teamwork to solve problems.
- ☑ **Basic Non-Negotiables**
 - Many jobs in this industry require security/background checks, you must be 100% truthful at all times.

HIGH SCHOOL DIPLOMA

TEALS programs in CCSD, BCSD, DDZ

📅 4 years 💰 \$27K-\$40K+

Help Desk Associate
Computer User Support Specialist
Technical Support Representative

CERTIFICATIONS

Trident Technical College, EOP:

📅 6-24 months 💰 \$40K-\$60K+

Web Developers & Web Designers
(if experience)
Jr Software Programmers/Developers
Network Security Technician
(CERTIFICATION ON THE NETWORK PLATFORM IS SOU+T)

YOUTH APPRENTICESHIP

Charleston Regional Youth Apprenticeships at Trident Technical College

📅 2 years



YA Computer Programming
YA Computer Networking
YA Cyber

BACHELOR'S DEGREE

EOP, Citadel, Charleston Southern, College of Charleston

💰 \$58K-\$75K+ 📅 48 to 60 months

Cyber Security Engineer
Information Assurance Analyst
Network Administrator/Systems Administrator
Network Engineer
User Experience Engineer *(HUMAN/COMPUTER INTERACTION)*
Software Engineer



ASSOCIATE'S DEGREE

EOP, Trident Technical College

💰 \$45K-\$72K+ 📅 24 to 36 months

Web Developers & Web Designers
Operations Support Analyst
Full Stack Developer
Network Support Technician



MASTER'S DEGREE

Citadel, Charleston Southern University

💰 \$100K-\$200K+

Software Engineering Team Lead
Sr. Data Administrator
Sr. Cloud Architect
Sr. Software Engineer
Sr. Systems Engineer

WITH GUIDANCE FROM THE FOLLOWING LOCAL EMPLOYERS

blackbaud

eGroup

BoomTown!

BUSINESS OCCUPATIONS

WHAT CAN I DO NOW?

- ☑ Be Curious, learn to research.
- ☑ Take advantage of Career and Technical Education business classes at your high school.
- ☑ Take a summer internship or even a one day job shadow - every experience teaches you something.
- ☑ Make a Tallo profile and continue to build it over time.

DO IT QUICK!



You can earn a Continuing Ed certification from Trident Technical College in Accounting, Business and Interpersonal Skills, Bookkeeping, Human Resources - some in as little as 6 weeks.

HIGH SCHOOL DIPLOMA

Business Career Academies in BCSD, D12 and LCSD

4 years \$23K-\$35K+

- Customer Service Representative
- Accounts Receivable Clerk
- Accounts Payable Clerk
- Office Assistant/Receptionist

CERTIFICATIONS

Trident Technical College

6 to 24 months \$30K-\$40K+

- Bookkeeping Assistant
- Accounting Clerk
- Digital Marketing Communication

YOUTH APPRENTICESHIP

Charleston Regional Youth Apprenticeships at Trident Technical College

2 years

YA Bookkeeping - Pre Accounting

TALENT DEMAND

1,800

There are over 1800 job openings in the Business Management and Finance sectors beyond the local graduate output.

DID YOU KNOW?



Many employers provide tuition support or tuition reimbursement toward certification or degrees relevant to your job.

DID YOU KNOW?



The average Purchasing Agent in the region can earn \$72,630, the average Accountant makes \$58,330.

The average annual salary of General Managers of businesses in the Charleston Metro Area is \$106,500, not including benefits.

BACHELOR'S DEGREE

Liberal, Charleston Southern, College of Charleston, ECF

\$40K-\$60K+ 48 to 60 months

- Accountant/Assistant Controller
- Auditor
- Financial Analyst
- Human Resources Specialist
- Buyer/Purchasing Agent
- Financial Advisor
- Mortgage Banker
- Commercial Banker
- Logistician



MASTER'S AND BEYOND

Graduate, Charleston Southern, College of Charleston, CFP

\$80K-\$100K+ 24 to 36 months

- CEO
- CEO/Finance Director/Controller
- COO, VP Operations
- CHRO/Chief Human Resources Officer
- Diversity Officer
- Strategy Manager
- Market Leader

ASSOCIATE'S DEGREE

Trident Technical College

\$37K-\$47K+ 24 to 36 months

- Full-Charge Bookkeeper
- Cost Accountant
- Human Resources Assistant
- Office Manager
- Payroll Analyst



SKILLS NEEDED

- ☑ **Communication/Listening Skills**
 - Effective verbal and written and body language communication is required for any job.
 - Adapt to different cultures and people, be a team player.
- ☑ **Customer Service Skills**
 - The Customer comes first. Everyone is a customer including internal co-workers.
 - Be aware of your tone of voice and how you approach different people.
- ☑ **Detail Oriented Skills**
 - Take responsibility for your knowledge of office software, use initiative to practice and improve your knowledge of office software.
 - Stick to deadlines.
- ☑ **Problem Solving/Analytical Skills**
 - Learn to troubleshoot and think on your feet as small problems arise. Research the issue and take the initiative to solve the problem.
- ☑ **Math Skills**
 - Understand basic algebra. Perform basic math operations, percentages, conversion, and use of a calculator.
- ☑ **Basic Non-Negotiables**
 - Show up. Arriving on time means arriving a little early.
 - Know your industry and dress for success, look like a professional.
 - Remember all new employees must pass a drug test and some companies will not hire you if you have a criminal record.

WITH GUIDANCE FROM THE FOLLOWING LOCAL EMPLOYERS



MANUFACTURING OCCUPATIONS

WHAT CAN I DO NOW?

- ☑ Be curious, learn to research.
- ☑ Look for Mechatronics, Robotics or Engineering courses at your high school.
- ☑ Get a Continuing Education Certification.
- ☑ Take apart a small machine. Learn all you can and put it back together.
- ☑ Build a Tallo profile and add to it over time.
- ☑ Do several job shadows - every experience teaches you something.

DO IT QUICK!



You can earn a Continuing Ed certification from Trident Technical College in Production, Equipment and Machinery training, Industrial Safety, Quality Control or Supply Chain - some just 6 weeks long!

HIGH SCHOOL DIPLOMA

STEM Career Academies in BCSO, DD2 and CCSO

📅 4 years 💰 \$21K-\$31K



General Assembler
Production Associate

CERTIFICATIONS

Trident Technical College

📅 6 to 24 months 💰 \$30K-\$48K+

Aircraft Mechanical Tech/
Industrial Mechanic
CNC Machine Tool Operator
Robotics Tech
Machining/Mechatronics Technician
Welder

YOUTH APPRENTICESHIP

Charleston Regional Youth Apprenticeships at Trident Technical College

📅 2 years



Machine Tool Technology
Industrial Mechanics

TALENT DEMAND

The average experienced Industrial Mechanic in Charleston makes more than \$25 per hour or \$53,000 per year, not including benefits.

The average experienced Mechanical Engineer in Charleston makes about \$43 per hour or about \$90,000 per year, not including benefits.

800+ There are 800+ production job openings listed on scworks.org in the Charleston Metro Area. Listings can change daily.

2.38 TRILLION Manufacturers contribute 2.38 trillion to the U.S. economy.

DID YOU KNOW?



Many employers provide tuition support or tuition reimbursement toward certification or degrees relevant to your job.

DID YOU KNOW?



Did you know that Advanced Manufacturing is Clean, Cool, Lucrative?

These manufacturers, Boeing, Volvo and Mercedes-Benz Vans, together hired more than 2,500 people last year. Your neighbors, friends and family members manufacture vehicles right here in Charleston and then ship them all over the world!

BACHELOR'S DEGREE

ECPI, Citadel (Charleston Southern University)

💰 \$45K-\$75K+ 📅 48 to 60 months

Materials Scientist Engineer
Industrial Engineer
Mechanical Engineer
Manufacturing Test Engineer
Lean Manager
Purchasing Supervisor



ASSOCIATE'S DEGREE

ECPI, Trident Technical College

💰 \$35K-\$55K+ 📅 24 to 36 months

Industrial Engineering Tech
Electrical Engineering Tech
Assembler and Mechanics Tech
Industrial Production Supervisor
Service Engineer Tech
Controls Service Tech

SKILLS NEEDED

- 🗨️ **Communication/Listening Skills**
 - Communication skills are a must, including the appropriate method of communication.
 - Acceptable written skills always require the use of solid grammar, correct spelling and punctuation.
- 🔧 **Problem Solving/Analytical Skills**
 - Learn to troubleshoot and think on your feet as small problems arise.
- 📐 **Math Skills**
 - Knowledge of geometry concepts, working to scale, relating point A to point B. Ability to use a tape measure and determine the distance across a surface.
 - Knowledge of conversions and working with fractions gives a competitive edge.
- 🔄 **Ability to be cross-trained**
 - The ability and intention to be cross trained makes an employee much more valuable. If you can fill in when someone is absent you will get noticed by management. Employees who are more valuable and have good attitudes get promoted.
- 📋 **Basic Non-Negotiables**
 - Be honest and dependable. Being on time means arriving 15 minutes early.
 - Remember all new employees must pass a drug test and some companies will not hire you if you have a criminal record.

WITH GUIDANCE FROM THE FOLLOWING LOCAL EMPLOYERS

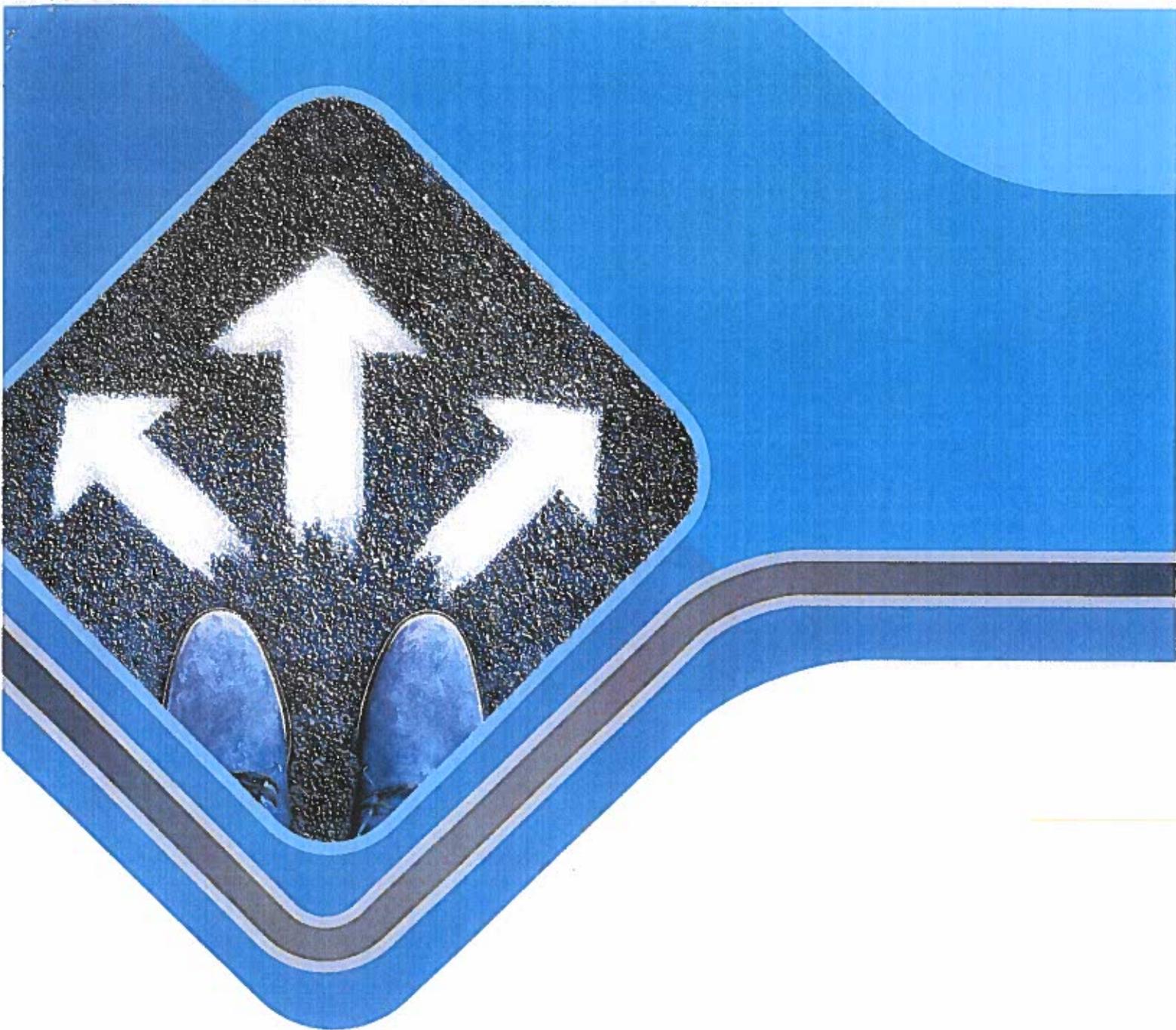


Mercedes-Benz



BOSCH





Charleston Metro
Chamber of Commerce 

 **CAEL**
Linking Learning and Work