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## State Sector Strategies for Talent Pipeline Systems

Michael Bartlett  
Martin Simon

As state economies continue to experience low overall levels of unemployment, the greatest challenge facing many American businesses seeking to grow and remain competitive is finding the talent they need. Although estimates of the size and severity of the skills gap vary and arguments persist about the existence of a skills gap or mismatch, there is consensus that there is a long-term need to focus on ensuring that state systems for education and training meet the needs of their state’s industries and ensure that workers can access good careers across their lifetimes. Governors, state legislators, and policy leaders have had a clear focus on a variety of strategies that build these “talent pipeline” systems. Sector strategies are a group of approaches being implemented by many states to build their talent pipeline systems through supporting regional industry sector partnerships.

Although they go by many names, the core focus of industry sector partnerships is to bring together businesses at scale to align education and training to broader economic needs. Sector partnerships serve as proven, successful vehicles for communicating the needs of industry to the public sector, ultimately serving both workers and industry. States play a key role in supporting industry sector partnerships by providing an environment in which local and regional efforts can grow and be sustained. States are increasingly working to embed sector strategies into their broader talent pipeline ecosystem by aligning K–12 and postsecondary education, workforce development, and economic development.

This chapter briefly summarizes the larger trends driving the need for these partnerships, outlines the core capabilities of high-quality state systems to guide states in scaling industry sector partnerships, and posits a new opportunity and common language to connect sector

strategies, career pathways, and industry clusters as the core of states' broader talent pipeline systems.

## **LABOR MARKET FORCES ACCELERATE THE IMPORTANCE OF SECTOR STRATEGIES**

Several intersecting labor market forces are increasing the importance of industry sector partnerships across states. As state economies improved after the Great Recession, record-low levels of unemployment leading to a tight labor market threaten to constrain the ability of businesses to grow. Although several states hope to increase their rates of workforce participation to address this threat, they are constrained because the levels and types of educational attainment among their populations do not match projected workforce demands. For example, the Georgetown University Center on Education and the Workforce has estimated that more than 65 percent of jobs will require some postsecondary education by 2020 (Carnevale, Smith, and Strohl 2013), but only 45.8 percent of Americans currently have a certificate, associate's degree, bachelor's degree, or above (Lumina Foundation 2017). Although predictions vary, this mismatch could lead to a shortage of more than five million workers with postsecondary credentials by 2020 (Carnevale, Smith, and Strohl 2013). As jobs increasingly require higher levels of education and training, industry engagement strategies will need to be more focused on supporting long-term educational attainment.

Compounding these changes are the retirements of baby boomers (people born between 1946 and 1964). In 2002 baby boomers made up 60 percent of workers across all industries, and while the Great Recession caused some workers to postpone retirement, that pent-up demand is now accelerating the retirement rate—by 2013, baby boomers comprised only 46 percent of the labor market (Deloitte 2015). These retirements seem likely to exacerbate educational attainment gaps because the workers filling these positions are more likely to be from populations that have lower levels of educational attainment, including immigrants and racial and ethnic minorities. In fact, employers are already experiencing the impact of this and other trends, with routine surveys

of employers consistently citing difficulties finding skilled workers as a primary concern for CEOs and even as a constraint on growth (Manpower Group 2015). Deloitte's *2016 Global Manufacturing Competitiveness Index*, a survey of manufacturing executives, indicates that talent remains the top-ranked driver of a country's competitiveness (Deloitte 2016).

Considering these challenges, state government and business leaders have worked to think differently about how the public and private sectors can partner to meet their common goals. Industry sector partnerships have a track record of addressing these challenges by bringing together leading employers in specific sectors with education, training, and economic development organizations to find solutions. Furthermore, states have more opportunities today to support such approaches with new flexibility under the Workforce Innovation and Opportunity Act (WIOA), as well as the opportunity to make connections to K–12 education through the flexibility of the Every Student Succeeds Act (ESSA).

## **OPPORTUNITIES THROUGH FEDERAL LEGISLATION**

In addition to state actions to support and expand industry sector partnerships, the passage of WIOA codified support for industry sector partnerships as a key state strategy to address current and future workforce challenges. WIOA offers state (and local) leaders an opportunity to think across systems about strategies to address existing workforce challenges and position such efforts to address future challenges. By requiring states to describe their sector strategies in their state plans, WIOA has given them an opportunity to develop a consensus on strategies that support industry sector partnerships throughout the state. WIOA encourages states to make coordinated investments in industry sector partnerships and provides governors and state workforce development boards a chance to ensure their industry sector partnerships have the components and partners necessary for success. Washington State used the WIOA state planning process to set definitions and goals for its sector partnerships across the state as a collaboration of the business, education, and workforce and economic development sectors (Bartlett 2018).

Another example is Colorado where they launched the “Next Generation of Sector Partnerships.” It is a new model for increasing the depth and scope of expanding and scaling sector partnerships championed by the state’s workforce development board (Colorado Workforce Development Council), which serves as an industry-led, cross-agency coalition charged with implementing the governor’s economic development plan, the “Colorado Blueprint,”<sup>1</sup> particularly, the core objective “to educate and train the workforce of the future.” Since launching the Next Generation of Sector Partnerships, Colorado has used state and local WIOA funds to grow its sector partnerships to include 23 partnerships representing almost every geographic area in the state and seven different industries.

One of the important tools available to governors under WIOA is each governor’s 15 percent set-aside funding. These funds can be used strategically in a variety of ways to scale up the formation of industry sector partnerships. One way is to provide incentive funds through competitive grants to support pilot efforts. Another is to provide technical assistance and professional development to build regional capacity to scale partnerships that can include opportunities among regional stakeholders to gain a mutual understanding of the sector partnership model and learn about effective industry analysis and employer engagement approaches. States can also use the funds to identify best practices and share them across regions. With the set-aside fully restored under WIOA, more states are investing these funds in support of industry sector partnerships. An example of several of these strategies being put into action is taking place in New Jersey. New Jersey is using a part of their WIOA set-aside to support the creation of Talent Networks across the state, including \$8.4 million in grants to create regional Talent Development Centers that will serve as clearing houses for strategies to develop and implement career pathways in a specific industry (New Jersey Department of Labor and Workforce Development, n.d.). Talent Networks will be tasked with working with partners across education, the private sector, and workforce development professions to develop new industry partnerships to meet employer demand.

In addition to WIOA, passage of the ESSA has given states an opportunity to develop stronger alignment between K–12 education and the workforce, as well as require states to provide connections to employers and the world of work. For example, state ESSA plans must promote

skills attainment important to in-demand occupations or industries in the state as well as demonstrate that the state will provide work-based learning opportunities that provide students in-depth interaction with industry professionals. While many state plans have yet to be finalized, more than a dozen states have discussed building various measures of career readiness into their school accountability systems.

## **HIGH-QUALITY STATE SYSTEMS TO BRING SECTOR PARTNERSHIPS TO SCALE**

As industry sector strategies have evolved, they provide an important connection between workforce development, education, and economic development by directly addressing the needs of employers in becoming more productive and competitive and aligning the education and training efforts with those needs. The most effective state strategies in support of regional industry sector partnerships are coordinated across state agencies to align policy, integrate resources, and define and agree on performance metrics. High-quality industry sector partnerships cannot be sustained without measuring their impact for employers, workers, and the community, and they require a systemic approach that embeds funding in existing funding streams and moves beyond pilot funding. States are best positioned to drive this systemic change and move from supporting transactional activities to transformative strategies.<sup>2</sup>

The state role in industry sector partnerships has evolved from one of providing general policy guidance and funds for pilot projects to embedding sector strategies as a key component of their talent pipeline and economic competitiveness strategy, all in recognition of the fact that businesses must drive the conversation and determine their needs. In this evolved role, states create an ecosystem in which regional industry sector partnerships can take root, grow, and be sustained over time. A good example is the Commonwealth of Pennsylvania where successful industry-focused models evolved by integrating the economic development model of “cluster partnerships” that address the comprehensive needs of the industry with the workforce development model of “sector initiatives” into the “Next Generation of Industry Sector Partnerships”<sup>3</sup>

model that puts business at the center. Pennsylvania is making annual targeted investments in regional industry partnerships as part of building a pipeline of talent that business needs to grow and prosper.

As the state role has evolved, six core capabilities have emerged as important to scaling up statewide efforts. These capabilities are identified in an “action guide” by the Employment and Training Administration (ETA) and described below (U.S. Department of Labor 2016):

- 1) **Shared Vision and Goals:** Develop a shared vision, across key agencies, of sector strategies that focus on serving and positively impacting the state’s economy, businesses, and job seekers.
- 2) **Industry Data Analysis and Tools:** Provide rigorous labor market data and effective tools to help local and regional sector partnerships make informed decisions about target sectors and investments.
- 3) **Training and Capacity Building:** Provide technical assistance to local and regional areas to expand their capacity to build quality sector partnerships.
- 4) **Awareness and Industry Outreach:** Effectively promote the value of sector partnerships and actively recruit industry champions to participate at a local level.
- 5) **Administrative and Legislative Policy:** Ensure there are necessary policies and funding mechanisms in place that help establish, sustain, and scale local sector partnerships.
- 6) **Performance Measurement:** Measure the success of sector strategies, and use that information to drive policy and practice.

These six capabilities provide a framework to guide states in launching and scaling up industry sector partnerships.<sup>4</sup> They are gleaned from successful practices by states over more than a decade. Although each state may differ in how these capabilities manifest, they represent the common elements of high-quality state systems. It is important that states assess their effectiveness in implementing these capacities and make continuous improvements along the way.

## **Shared Vision and Goals**

In developing a shared vision and goals, it is important that the vision and goals are adopted across state agencies and organizations that are directly involved in talent development and engagement with industry, including the governor's office, workforce and economic development agencies, and postsecondary and K–12 education agencies. In many states, the state workforce development board authorized under WIOA plays an important coordination role in developing the vision and overseeing its implementation. Other states have established a special advisory committee or board to guide the direction and implementation of partnerships. The vision and goals can take a variety of forms, from a formal or informal agreement to an executive order or legislative policy. Governors can, and often do, play a critical role in this coordination and integration.

## **Industry Data Analysis and Tools**

Across state agencies there is often a significant amount of labor market data that can be packaged to inform local decisions in establishing regional industry partnerships. A key role for states is to identify leading growth industries across the state and specific to its regions, which helps regional collaboratives coalesce around target industries. States can also provide industry diagnostic tools to create profiles of regional industries. In addition, states can help local governments map supply-side data to better understand the makeup of their workforce to determine potential skill mismatches with industry needs.

## **Training and Capacity Building**

States can support the launch and success of industry sector partnerships by providing training and capacity building for local regions. One important activity is peer-to-peer sharing of lessons learned from both successes and failures. Several states also conduct regional and local training to ensure that the conveners of industry sector partnerships are well equipped to enable industry to lead the conversation. This support has proven to be critical in ensuring that the industry partnerships have the knowledge tools they need to be effective and to achieve desired outcomes.

## **Awareness and Industry Outreach**

States are well positioned to raise the profile and build awareness of the value of industry sector partnerships with both internal and external audiences. Externally, states can communicate the importance of industry sector partnerships as a key element of educational attainment to parents, businesses, students, local governments, and educators. Internally, states must communicate across agencies and with staff and practitioners on the connections between all their programmatic work as part of the larger goal of creating economic opportunity. Governors can play a key role by using the “bully pulpit,” and their convening authority and relationships with business and local officials.

## **Performance Measurement**

For industry sector partnerships to be sustainable and meaningful for state policymakers and businesses, progress in meeting the needs of employers and in connecting students and workers to good jobs must be measured. Performance metrics set the benchmark for quality and performance to ensure consistency and inform continuous improvement. While states are beginning to make progress in this area, considerable effort, including research and policy development, is still needed.

## **Administrative and Legislative Policy**

Legislative and administrative policies can play a critical role in scaling up and sustaining industry sector partnerships. They are most effective when the policies are combined to support cross-system coordination and systemic change. At least 18 states have legislation that supports sector partnerships to connect industry with education and training systems to address the talent needs of businesses (U.S. Department of Labor 2016).

By taking a comprehensive approach to implementing these core capacities, states can help businesses meet their talent needs, be more competitive, and provide students and workers with paths toward good jobs and successful careers.



## **INTEGRATING PARALLEL INDUSTRY-ENGAGEMENT STRATEGIES: THE TALENT PIPELINE APPROACH**

The model of local business-led partnerships embedded in and supported by state structures need not be confined narrowly to the workforce development system as defined by WIOA. In fact, there is a strong case to be made for such state strategies to become embedded as a permanent component of larger state systems for talent development, beyond meeting the needs of specific local groups of employers at specific points in time.

By integrating the sector strategy core concept of letting the needs of the economy and businesses inform state decision making, the broader talent pipeline approach recognizes the critical need for states to think of their current disparate systems for education (K–12 and postsecondary), workforce development, and economic development as facets of the same overarching core state mission: to ensure economic vitality for businesses and provide access to meaningful choices and economic prosperity for citizens. This thinking requires moving beyond the traditional silos of state government and asking questions about the basic functions of state government. More than simply better aligning existing program or vision statements (although this is a necessary initial step), there is a clear need to move to integrate these state functions.

Several state systems have been independently moving in this direction. An important evolution of state sector strategies has been their work to connect career pathway systems into industry sector partnership strategies. From the education perspective, the career pathway movement represents the same underlying forces—state supports for local partnerships that more strongly connect individuals to an industry with long-term career prospects. Each of these approaches is oriented to align with the needs of industry. Industry sector partnerships by design engage with employers within a single industry with a focus on their talent needs. Career pathways provide a clear sequence of courses, work experiences, support services, and stackable credentials aligned with employment opportunities in an industry and advancement to higher education levels. Successful career pathway approaches include regular engagement with employers to ensure that credentials and courses of study align with industry skill needs.

These approaches evolved on parallel paths—with workforce development policymakers implementing sector approaches focused on meeting employer needs, and education policymakers implementing career pathway partnerships to meet student needs. Given their complementary goals, this is an opportunity for states to develop an overall strategy to build a skilled workforce that weds these two strategies and creates a stronger state response overall.

WIOA and ESSA integrate these approaches and call on local workforce development boards and schools and colleges to integrate their efforts to engage employers. The integration of these approaches provides a real opportunity for systemic change to strengthen a community's ability to grow its economy through the preparation of a skilled workforce aligned with industry needs.

Another level of integration of industry-engagement strategies is occurring in many states, with the alignment of career pathway systems, sector strategies, and industry clusters. Industry clusters are networks of firms related to common markets, supply chains, infrastructure, innovation and technology, and labor pools and have been an important feature of many states' economic development strategies for years (NGA, Corporation for a Skilled Workforce, and National Skills Coalition 2013). Historical examples include the wine industry in Napa Valley, the automotive industry in Detroit, and the fashion industry in New York City. One of the most important factors contributing to industry growth and economic competitiveness is a skilled workforce. By integrating their career pathway systems with sector strategies aligned with relevant industry clusters, states are better able to communicate the interests and needs of employers to education and training providers and provide paths to good jobs for students and job seekers.

## **COMMON LANGUAGE: CORE ELEMENTS OF STATE TALENT PIPELINE SYSTEMS**

In addition to the roles states play to support strong sector-based industry partnerships and develop career pathways, states can make stronger connections across education and workforce and economic development. Increasingly, states are working to fully integrate these

systems as core elements of a broader talent pipeline system. *America Works: Education and Training for Tomorrow's Jobs*<sup>5</sup> outlines several common elements across these systems, emphasizing cross-system integration to expand postsecondary credential attainment as the “new minimum” for workers to achieve middle class status and meet the future skill needs of employers (National Governors Association 2014). These elements, identified by states, represent a common language across state government for building talent, bringing complementary approaches under one roof. Four core elements for building an integrated Talent Pipeline System have been identified as priorities by states (National Governors Association, forthcoming):

- 1) Set a vision with common goals.
- 2) Support sector-based industry partnerships.
- 3) Align resources and incentives to meet the goals.
- 4) Harness data resources to measure success.

These elements are drawn from the core capacities for scaling and sustaining sector strategies discussed earlier and form a common framework for building a broader talent pipeline system.

Beyond a single program or initiative, many states have recognized that the talent pipeline approach, including support for industry sector partnerships, must be the foundation for how communities build their talent pipelines to meet the new minimum of postsecondary education. Recognizing that a variety of state and local entities including K–12 and postsecondary educational institutions, state and local workforce development boards, economic development organizations, and others have developed and will continue to develop multiple strategies to engage industry, a talent pipeline approach can create a clearer understanding of the terminology for both policymakers and practitioners. This common language must answer both what the purpose of integrated efforts are, and how working together will lead to stronger outcomes for every partner. To overcome existing barriers, there must be a clear reason for action that benefits all stakeholders, as well as a clear path forward, or road map, to help both practitioners and policymakers see how they can drive change that meets their needs.

Governors and other state leaders can have a significant influence on the direction of the education, training, and economic development systems in their state. By establishing a vision and measurable goals, they

provide a framework to guide policy across the state. At least nine states have established goals for postsecondary attainment, for example, Tennessee's "Drive to 55 Alliance," which calls for 55 percent of Tennesseans to be equipped with a postsecondary credential by 2025 (Drive to 55 Alliance 2018). Another example is the "Future Ready Iowa" goal of 70 percent of Iowans achieving some form of postsecondary credential by 2020 (Office of the Governor of Iowa 2014).

In addition to setting policy and guidance for the local level, states also make significant and continual investments in those systems. By engaging stakeholders to identify and map the existing resources and funding that currently support a broader talent pipeline system, states can develop comprehensive asset maps of their talent pipeline systems and create trust in an unbiased process that allows stakeholders to imagine new ways to braid and integrate resources. States that perform such asset mapping are in a stronger position to analyze the way existing resources have been used across agencies and programs and critically examine outcome measurement, accountability mechanisms, and alignment with strategic plans across state agencies.

For states to have clear evidence that their efforts to align education and workforce and economic development have moved their state closer to meeting their vision and goals, they must have plans for collecting and analyzing relevant data to demonstrate results and keep partners accountable. States can work to leverage the wealth of available data to build and strengthen their state longitudinal data systems to provide better information on how individuals enter and move through the state talent pipeline systems. Governors and state leaders can harness these data resources by defining a set of key policy questions they want answered about the state's talent needs. Having a clear set of policy questions helps signal what is important and provides a comprehensive picture of the overall talent pipeline system rather than outcomes for specific programs or individual agencies.

## CONCLUSION

State sector strategies have evolved as a key element of state talent pipeline systems integrated with career pathways and economic devel-

opment strategies to address the current and future workforce challenges faced by states. In building their talent pipeline systems, an increasing number of governors are setting postsecondary attainment goals in line with projected growth in jobs requiring postsecondary credentials. To achieve these goals, states are coordinating strategies across their education and workforce and economic development systems, capitalizing on available data across these systems to measure success and inform policy and investment decisions. The ultimate vision is to provide paths to good jobs and careers for students and workers and to ensure that employers across industries have the talent they need to be competitive and grow.

## Notes

1. <https://choosecolorado.com/programs-initiatives/colorado-blueprint/> (accessed March 7, 2018).
2. The NGA Center for Best Practices, in partnership with the Corporation for a Skilled Workforce and the National Network of Sector Partners, conducted a four-year policy academy on accelerating the adoption of sector strategies working with policy teams from 12 states. Lessons from that project informed a second project with cross-system teams from 14 states focused on building their talent pipeline systems by integrating education, workforce, and economic development systems.
3. Next Generation Industry Partnerships put businesses at the center of a coordinated workforce and economic development system that reacts to businesses' defined opportunities and priorities for action.
4. These core capacities have been embedded and refined in the "Next Generation Sector Partnerships" academies and technical assistance provided by the Woolsey Group, LLC and other associates for states and local governments on implementing sector partnerships.
5. *America Works: Education and Training for Tomorrow's Jobs* was the culminating report from Oklahoma Governor Mary Fallin's initiative as chair of the NGA. The initiative emphasized cross-system integration to expand postsecondary credential attainment as the "new minimum" for workers to achieve middle-class status and meet future skill needs of employers. The initiative led to a three-year NGA project with cross-system teams from 14 states focused on building their talent pipelines.

## References

- Bartlett, Michael. 2018. *Paving the Way to Meet the Economy's Talent Needs: A Roadmap for States*. Washington, DC: National Governors Association, Center for Best Practices.

- Carnevale, Anthony P., Nicole Smith, and Jeff Strohl. 2013. *Recovery: Job Growth and Education Requirements through 2020*. Washington, DC: Georgetown University, Georgetown Public Policy Institute, Center for Education and the Workforce.
- Deloitte Development LLC and Manufacturing Institute. 2015. *The Skills Gap in U.S. Manufacturing: 2015 and Beyond*. Washington, DC: Deloitte Development LLC.
- Deloitte Touche Tohmatsu Limited and Council on Competitiveness. 2016. *2016 Global Manufacturing Competitiveness Index*. New York: Deloitte Touche Tohmatsu Limited.
- Drive to 55 Alliance. 2018. <http://driveto55.org/> (accessed March 7, 2018).
- Lumina Foundation. 2017. *A Stronger Nation: Learning beyond High School Builds American Talent*. Indianapolis, IN: Lumina Foundation. <http://strongernation.luminafoundation.org/report/2017/#nation> (accessed March 7, 2018).
- Manpower Group. 2015. *2015 Talent Shortage Report*. 10th Annual Talent Shortage Survey. Milwaukee, WI: Manpower Group.
- New Jersey Department of Labor and Workforce Development. n.d. *New Jersey Career Connections*. Trenton, NJ: New Jersey Department of Labor and Workforce Development. [http://careerconnections.nj.gov/careerconnections/partners/talent/talent\\_networks.shtml](http://careerconnections.nj.gov/careerconnections/partners/talent/talent_networks.shtml) (accessed March 7, 2018).
- National Governors Association. 2014. *America Works: Education and Training for Tomorrow's Jobs*. 2014. Washington, DC: National Governors Association.
- . Forthcoming. "Paving the Way to Meet the Talent Needs of the Economy: A Roadmap for States." Working paper. Washington, DC: National Governors Association.
- National Governors Association, Corporation for a Skilled Workforce, and National Skills Coalition. 2013. *Sector Strategies Coming of Age: Implications for State Workforce Policymakers*. Washington, DC: National Governors Association.
- Office of the Governor of Iowa. 2014. Future Ready Iowa Fact Sheet. Des Moines, IA: Office of the Governor of Iowa. <https://governor.iowa.gov/sites/default/files/documents/FutureReadyIowa-FactSheet.pdf> (accessed March 7, 2018).
- U.S. Department of Labor, Employment and Training Administration. 2016. *State Support for Sector Partnerships: A Guide for Action*. ETA Sector Strategies Technical Assistance Initiative. Washington, DC: USDOL.