

**WASHINGTON STATE  
WORKFORCE TRAINING AND EDUCATION COORDINATING BOARD  
MEETING NO. 158  
NOVEMBER 17, 2011**

**LISTING STRATEGIC INDUSTRY CLUSTERS IN STATE AND LOCAL PLANS**

In 2009, at the request of the Workforce Training and Education Coordinating Board (Workforce Board), the Legislature enacted Substitute House Bill 1323 establishing strategic clusters as the organizing framework for coordinating state and local workforce and economic development planning and service delivery. State statutes direct the Workforce Board to identify strategic industry clusters for workforce development in the state plan for workforce development, *High Skills, High Wages 2008-2018: Washington's Strategic Plan for Workforce Development*. Statutes also direct Workforce Development Councils (WDCs) to identify area strategic clusters in their local strategic plans.

There have been two phases to this effort. The first phase consisted of a state quantitative analysis of the data to identify clusters, including which ones are more strategic than others. The second phase consisted of conversations and exchanges of data with local areas to reconcile state and local lists of strategic clusters. This second phase has now been completed.

In January of this year, the Board adopted the following motion:

**WHEREAS**, The state's regional strategic cluster list and the Workforce Development Councils' regional strategic cluster lists should be updated periodically to keep pace with changing economic conditions; and

**WHEREAS**, The Workforce Training and Education Coordinating Board will work jointly with the Workforce Development Councils to update and align regional strategic cluster lists;

**THEREFORE BE IT RESOLVED**, That the Workforce Training and Education Coordinating Board and the Workforce Development Councils amend their strategic plans to incorporate updated and aligned lists of regional strategic clusters once a six-month joint review and update process is completed.

With the completion of the second phase of this effort, it is time for the Board to append the updated list of strategic clusters to *High Skills, High Wages*, and to request that each WDC amend their local area Strategic Plan in order to incorporate the strategic cluster list for their area (if the WDC has not already done so).

**Board Action Required:** The Board has the option to discuss this topic and take action in January 2012, or adopt the recommended motion under this Tab.

## RECOMMENDED MOTION

**WHEREAS**, The Legislature enacted Substitute House Bill 1323, requested by the Workforce Training and Education Coordinating Board, to coordinate workforce and economic development around strategic industry clusters;

**WHEREAS**, SHB 1323 directed the Workforce Training and Education Coordinating Board and local Workforce Development Councils to identify strategic industry clusters in the state and area workforce development plans;

**WHEREAS**, The Workforce Training and Education Coordinating Board and the Economic Development Commission selected criteria for identifying industry clusters based upon guidelines in state statute and the input of a technical advisory committee;

**WHEREAS**, The Workforce Training and Education Coordinating Board contracted with independent researchers to apply the criteria to identify industry clusters in each of the 12 workforce areas in the state;

**WHEREAS**, The Workforce Training and Education Coordinating Board ranked the identified clusters by how strategic they are for workforce development; *and*

**WHEREAS**, The Workforce Training and Education Coordinating Board engaged the local Workforce Development Councils in a discussion of the state and local lists of strategic clusters in order to reconcile the state and local lists consistent with data and the criteria for identifying industry clusters;

**THEREFORE BE IT RESOLVED**, The Workforce Training and Education Coordinating Board appends the **Reconciled Lists of Strategic Clusters for Workforce Development** to *High Skills, High Wages: Washington's Strategic Plan for Workforce Development*;

**THEREFORE BE IT FURTHER RESOLVED**, The Workforce Training and Education Coordinating Board requests that each Workforce Development Council append the Reconciled List of Strategic Clusters for Workforce Development for its workforce development area to its local Strategic Plan.

## Background Information

### Identifying State and Local Strategic Industry Clusters

In 2009, at the request of the Workforce Training and Education Coordinating Board, the Legislature enacted Substitute House Bill 1323 establishing strategic clusters as the organizing framework for coordinating state and local workforce and economic development planning and service delivery. State statutes direct the Workforce Board to identify strategic industry clusters for workforce development in the state plan for workforce development, *High Skills, High Wages 2008-2018: Washington’s Strategic Plan for Workforce Development*. Statutes also direct Workforce Development Councils (WDCs) to identify area strategic clusters in their local strategic plans.

The Workforce Board and the Economic Development Commission established a workgroup to provide advice on identifying strategic clusters. The workgroup recommended that the process occur in two phases. The first phase should consist of a state quantitative analysis of the data to identify clusters, including which ones are more strategic than others. The second phase should consist of conversations and exchanges of data with local areas to reconcile state and local lists of strategic clusters.

### Phase I

The Workforce Board and the Economic Development Commission contracted with Paul Sommers of Seattle University, and William Beyers and Andrew Wenzl of the University of Washington to crunch the numbers and identify the clusters in each of the 12 workforce areas in Washington. Workforce Board staff then developed, and the Board approved, a methodology to rank the clusters in each area according to how strategic they are for workforce development. Strategic clusters for workforce development were identified by creating an index of the 12 variables provided in the Sommers’ analysis plus the variable of output per employee, and weighting three workforce variables to count twice, as shown below.<sup>1</sup>

**Rationale:** Of all the characteristics examined in the cluster study, **employment** and the **percent of middle- and high-wage occupations (jobs)** are the variables that offer the most direct indicators of a cluster’s potential to offer good and plentiful employment opportunities to the state’s workforce.

Based on these criteria, on March 12, 2009, the Workforce Board formally adopted a list of strategic clusters for the state’s 12 regional

Cluster Analysis Variables	Workforce Index
Location Quotient	✓
<b>Employment</b>	<b>Count twice</b>
Output	✓
Earnings/ Worker	✓
<b>Percent of Occs. in Middle Wage Range</b>	<b>Count twice</b>
<b>Percent of Occs. in High Wage Range</b>	<b>Count twice</b>
Change in Establishments 2001-07	✓
Change in Employment 2001-07	✓
Change in Wages 2001-07	✓
Projected Empl. Increase 2006-16	✓
R & D Occupations as a Percent of Total Empl.	✓
Exports as a Percent of Output	✓
Output/Employment	✓

<sup>1</sup> Sommers et al, *Industry Cluster Analysis for Washington State Workforce Development Areas*, November 2008. <http://www.wtb.wa.gov/ClusterAnalysis.asp>

## Workforce Development Areas.

At the same time, the Workforce Board adopted a policy for the use of the list of strategic clusters, as follows.

### **Purpose**

This policy explains how the Workforce Board will use *strategic* industry clusters for workforce development.<sup>2</sup> Focusing on strategic clusters helps assure that workforce investments are prioritized for clusters that have the best outlook for employment and wages.

### **Policy**

The Workforce Board policy is:

- 1) Strategic industry clusters shall be identified for the purpose of guiding and informing policy and investment decisions for workforce education and training, such as the awarding of discretionary funds for cluster-based workforce development initiatives.
- 2) Rankings of strategic clusters shall be used to steer investments toward those clusters that are most strategic for workforce development. The Workforce Board will guide investments toward clusters that are at the higher rather than the lower end of the strategic rankings.

### **Guiding Principles**

- Methodologies for identifying strategic clusters inform and guide investment decisions by basing them on evidence-based, quantitative data.
- Workforce and economic development partner agencies, such as the Department of Commerce, may work from different lists of strategic clusters because investment strategies vary.
- In the interest of consistency, the Workforce Board encourages partner agencies to use a shared set of cluster source data and indexing processes to identify strategic clusters.
- Clusters are but one of many strategies for workforce and economic development.
- Local areas may provide supplemental data and supporting evidence that the Workforce Board can use to improve lists of strategic clusters.
- *Potential* (or “emerging”) clusters are not identified in the scope of the 2008-2009 analysis of clusters and strategic clusters. They do, however, have a role in other workforce and economic development initiatives.
- The geographic locus of strategic clusters is regional, not statewide.
- Strategic cluster lists shall be updated periodically to keep pace with changing economic conditions.

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<sup>2</sup> **Industry Cluster:** A geographic concentration of interdependent competitive firms that do business with each other, including firms that sell inside and outside of the geographic region as well as support firms that supply new materials, components, business services, and other institutions including government and education.

## **Phase II**

The second phase consisted of exchanging data and holding discussions with WDCs in order to reconcile and improve the state and local lists of strategic clusters. In most cases, WDCs already had identified the industry clusters that they considered to be strategic for their local area. In each case, the local list and the state list for that area were either identical or mostly overlapping. By working together and by considering supplemental data and supporting evidence, state and local partners were able to add or expand, remove, narrow, refine and/or reprioritize clusters on the cluster lists.

See the proposed state lists of strategic clusters on the following page.

## Reconciled Lists of Strategic Clusters for Workforce Development

Workforce Development Area	Reconciled Strategic Clusters (by rank order unless <i>not</i> numbered)
<b>Olympic WDA</b> Clallam, Kitsap, and Jefferson Counties	<ol style="list-style-type: none"> <li>1. Navy</li> <li>2. Health Care, Rehabilitation, and Elder Care</li> <li>3. Marine and Advanced Manufacturing and Marine Port Activity</li> <li>4. Wood Products</li> <li>5. Aquaculture, Fisheries, and Fishing Vessel and Equipment Repair</li> <li>6. Technical Services</li> <li>7. Construction</li> <li>8. Wholesale Trade Distribution Services</li> <li>9. Tourism, Accommodation, Hospitality, Gaming and Recreation</li> </ol>
<b>Pacific Mountain WDA</b> Grays Harbor, Mason, Lewis, Thurston, and Pacific Counties	<ol style="list-style-type: none"> <li>1. State Government</li> <li>2. Forest Products</li> <li>3. Health Care</li> <li>4. Business Support Services</li> <li>5. Fishing, Seafood Processing, and Shipbuilding</li> <li>6. Warehousing and Storage</li> <li>7. Agriculture and Forestry Support</li> <li>8. Heavy and Civil Engineering and Construction</li> </ol>
<b>Northwest WDA</b> Whatcom, Skagit Island, and San Juan Counties	<ol style="list-style-type: none"> <li>1. Manufacturing (Advanced Manufacturing)               <ol style="list-style-type: none"> <li>1.a. Petroleum &amp; Coal Products Manufacturing</li> <li>1.b. Wood Product Manufacturing</li> <li>1.c. Primary Metal Manufacturing</li> <li>1.d. Food Manufacturing</li> <li>1.e. Machinery Manufacturing</li> <li>1.f. Transportation Equipment Manufacturing (including aerospace and marine)</li> </ol> </li> <li>2. Construction</li> <li>3. Health Care</li> </ol>
<b>Snohomish County WDA</b> Snohomish County	<ol style="list-style-type: none"> <li>1. Aerospace and Composites Manufacturing</li> <li>2. Computer and Electronic Manufacturing (includes Medical Devices)</li> <li>3. Ship and Boat Building and Composites Manufacturing</li> <li>4. Architectural and Structural Metals Manufacturing</li> <li>5. Wood Furniture and Cabinets Manufacturing</li> <li>6. Heavy Construction (roads, bridges, utilities, infrastructure)</li> <li>7. Research and Development in Biotechnology</li> <li>8. Forest Products*</li> <li>9. Navy*</li> </ol>
<b>Seattle-King County WDA</b> King County	<ol style="list-style-type: none"> <li>1. Health Care (including life sciences research and development)</li> <li>2. Manufacturing               <ol style="list-style-type: none"> <li>2.a. Aerospace &amp; Transportation Equipment</li> <li>2.b. Overhead Cranes &amp; Hoists</li> <li>2.c. Medical Devices</li> <li>2.d. Fisheries &amp; Seafood Processing</li> </ol> </li> <li>3. Construction</li> <li>4. Trade, Transportation &amp; Logistics</li> <li>5. Information Technology</li> </ol>

\*Indicate clusters that the state lists as strategic for the area, but the local Workforce Development Council does not.

<p><b>Tacoma-Pierce County WDA</b> Pierce County</p>	<p>National Security Information Technology/Computer Systems Design and Related Services Health Care Trade/Deep Sea Transportation and Warehousing Logistics Construction Food Manufacturing Aerospace Manufacturing Building Products Manufacturing</p>
<p><b>Southwest Washington WDA</b> Clark, Cowlitz, and Wahkiakum Counties</p>	<ol style="list-style-type: none"> <li>1. Health Care</li> <li>2. Manufacturing <ol style="list-style-type: none"> <li>2.a. Wood Products</li> <li>2.b. Paper Products</li> <li>2.c. Machinery</li> <li>2.d. Electronics</li> <li>2.e. Food Product Manufacturing</li> </ol> </li> <li>3. High Tech/Information Technology <ol style="list-style-type: none"> <li>3.a. Electronics</li> <li>3.b. Telecommunications</li> </ol> </li> <li>4. Professional &amp; Technical Services</li> <li>5. Utilities</li> <li>6. Construction</li> </ol>
<p><b>North Central WDA</b> Chelan, Okanogan, Grant, Douglas, and Adams Counties</p>	<ol style="list-style-type: none"> <li>1. Agriculture</li> <li>2. Food &amp; Beverage Processing</li> <li>3. Health Care</li> <li>4. Chemical, Mineral and Metal Manufacturing</li> <li>5. Electrical Utilities - Power Generation</li> <li>6. Telecommunications</li> <li>7. Gambling and Recreation</li> </ol>
<p><b>South Central WDA</b> Yakima, Kittitas, Klickitat, and Skamania Counties</p>	<ol style="list-style-type: none"> <li>1. Agriculture and Food Processing</li> <li>2. Health Care</li> <li>3. Manufacturing <ol style="list-style-type: none"> <li>3.a. Plastics and Wood Products Manufacturing</li> <li>3.b. Fabricated and Metal Product Manufacturing</li> </ol> </li> <li>4. Clean Technology/Renewable Energy</li> <li>5. Warehousing/Distribution <ol style="list-style-type: none"> <li>5.a. Support Activities for Transportation</li> <li>5.b. Truck Transportation</li> </ol> </li> <li>6. Professional and Business Services</li> <li>7. Construction</li> </ol>
<p><b>Eastern Washington Partnership WDA</b> Ferry, Pend Oreille, Garfield, Stevens, Columbia, Lincoln, Whitman, Asotin, and Walla Walla Counties</p>	<ol style="list-style-type: none"> <li>1. Agriculture and Food Products/Transportation &amp; Distribution Chain</li> <li>2. Health Care</li> <li>3. Depository Credit Organizations</li> <li>4. Forest Products</li> <li>5. Mining</li> </ol>

<b>Benton-Franklin WDA</b> Benton and Franklin Counties	<ol style="list-style-type: none"> <li>1. Waste Management and Remediation</li> <li>2. Health Care Services</li> <li>3. Physical Science Research and Development</li> <li>4. Agriculture and Food Processing</li> <li>5. Advanced Manufacturing (To be specified)</li> <li>6. Business Support Services</li> </ol>
<b>Spokane Area WDA</b> Spokane County	<ol style="list-style-type: none"> <li>1. Health Services</li> <li>2. Aerospace and Advanced Manufacturing, including:             <ul style="list-style-type: none"> <li>• Plastics and rubber products</li> <li>• Metal and machinery</li> <li>• Computers and electronic products</li> </ul> </li> <li>3. Professional and Technical Services</li> <li>4. Business Support Services</li> <li>5. Energy, Waste Management, and Remediation</li> <li>6. Finance and Insurance</li> </ol>