Improving Higher Education Productivity: Investing in a 21st Century Workforce

Salem, Oregon

February 13, 2008
Percent of Adults with an Associate Degree or Higher by Age Group—Oregon, U.S. and Leading OECD Countries

Source: OECD, *Education at a Glance 2007*
Projected Change in Oregon Population by Age and Race/Ethnicity, 2006-25 (in Thousands)

<table>
<thead>
<tr>
<th>Age Group</th>
<th>White</th>
<th>African American</th>
<th>Hispanic</th>
<th>Native American</th>
<th>Asian</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-17</td>
<td>15,089</td>
<td>3,072</td>
<td>672</td>
<td>2,273</td>
<td>5,452</td>
</tr>
<tr>
<td>18-24</td>
<td>56,059</td>
<td>3,072</td>
<td>672</td>
<td>2,273</td>
<td>5,452</td>
</tr>
<tr>
<td>25-44</td>
<td>39,669</td>
<td>5,698</td>
<td>878</td>
<td>2,273</td>
<td>4,065</td>
</tr>
<tr>
<td>45-64</td>
<td>46,409</td>
<td>8,328</td>
<td>2,375</td>
<td>5,698</td>
<td>2,028</td>
</tr>
<tr>
<td>65 and Older</td>
<td>38,959</td>
<td>3,949</td>
<td>2,375</td>
<td>5,698</td>
<td>1,949</td>
</tr>
</tbody>
</table>

Total Change: 460,437
Educational Attainment of Population Age 25-64, 2005

Source: U.S. Census Bureau, 2005 ACS, Public Use Microdata Samples (PUMS)
Student Pipeline, 2004

Of 100 9th Graders, How Many…

- Graduate from High School: 91.3, 69.7, 72.4
- Directly Enter College: 57.3, 38.8, 32.9
- Enroll in Second Year: 42.0, 26.9, 21.9
- Graduate Within 150% of Program Time: 27.3, 18.4, 15.0
- Are Age 25-44 with a Bachelor’s Degree: 42.3, 29.7, 28.5

Source: NCES Common Core Data 2004; Tom Mortenson, Postsecondary Education Opportunity; NCES, IPEDS Fall 2004 Retention Rate File and Fall 2003 Enrollments, 2004 Graduation Rates; U.S. Census Bureau, 2005 ACS
Median Earnings of Population Age 25-64 by Level of Education, 2005

Source: U.S. Census Bureau, ACS
Percent of Civilians Age 25-64 Participating in the Workforce by Level of Education, 2005—Oregon

Source: Integrated Public Use Microdata Series 5% Sample, Minnesota Population Center
Oregon Net Migration of Residents Age 22-64 by Level of Education, 2004-05

Source: 2005 ACS, PUMS
Percent of Total Gross State Product by Industry and Comparison to U.S.

Source: Bureau of Labor Statistics
How Oregon Ranks Among Other States on Selected Measures for Education and Economic Development

- **Public High School Graduation Rates**: 28th
- **College-Going Rates of Students Directly Out of High School**: 45th
- **Three-Year Graduation Rates of Associate Students**: 31st
- **Six-Year Graduation Rates of Bachelor's Students**: 22nd
- **Overall Results on Student Pipeline** (Transition & Completion Rates, 9th Grade to College Completion): 38th
- **Migration Rate of College Graduates (Age 22-64)**: 8th
- **Difference in Earnings Between Associate & High School Diploma**: 41st
- **Difference in Earnings Between Bachelor's & High School Diploma**: 37th
- **Personal Income per Capita**: 29th
- **State New Economy Index**: 11th

Source: Bureau of Labor Statistics
The Goal: Oregon Reaching International Competitiveness by 2025

55% of Population Age 25-64 with College Degrees
### Reaching Top Performance by 2025 (55%)—Oregon

<table>
<thead>
<tr>
<th>Number</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1,265,298</td>
<td>Number of Individuals to Match Best-Performing Countries (55%)</td>
</tr>
<tr>
<td>361,760</td>
<td>Number of Individuals (Age 25-44) Who Already Have Degrees</td>
</tr>
<tr>
<td>903,538</td>
<td>Additional Production Needed (2005 to 2025)</td>
</tr>
<tr>
<td>463,540</td>
<td>Degrees Produced at Current Annual Rate of Production</td>
</tr>
<tr>
<td>183,472</td>
<td>Additional Residents with College Degrees from Net Migration</td>
</tr>
<tr>
<td>256,525</td>
<td>Additional Degrees Needed</td>
</tr>
<tr>
<td>12,826</td>
<td>Additional Degrees Needed per Year (Currently Produce 25,373 in All Sectors)</td>
</tr>
<tr>
<td>66.1%</td>
<td>Increase in Annual Associate and Bachelor’s Degree Production Needed</td>
</tr>
</tbody>
</table>
Collective Cost to Oregon, Assuming Tuition Stays the Same

$ 411 Million = Annual Costs of Additional Students at Current $ per Student

$ 722 Million = Current State Contribution

57% = Percent Increase in Annual State Support Needed
Average Cost to Students, Assuming No Additional State Investment

$ 2,158 = Additional Annual Costs to Students at Public Four-Year Institutions

30% Increase in Tuition and Fees
(Currently $ 7,200)

$ 2,134 = Additional Annual Costs to Students at Public Two-Year Institutions

79% Increase in Tuition and Fees
(Currently $ 2,701)
Educational Attainment in Oregon (Percent)

Current, In 2025 with Current Degree Production, and Best-Performing Countries in 2025

Current % of Adults Age 25-64 with College Degrees, 2005: 37.3
Projected % in 2025 with Current Annual Degree Production: 35.9
Projected % in 2025 with Current Annual Degree Production and Net Migration: 43.8
% Needed to Reach Best-Performing Countries by 2025: 55.0
How Can Oregon Reach International Competitiveness?

Current Degree Production Combined with Population Growth and Migration and Improved Performance on the Student Pipeline Measures

- Degrees Produced 2005-25 with Current Rate of Production: 463,540
- Additional Degrees from Population Growth: 60,389
- Additional Degrees from Net Migration of College-Educated Residents: 183,472
- Reaching Best Performance in High School Graduation Rates by 2025: 9,893
- Reaching Best Performance in College-Going Rates by 2025: 50,221
- Reaching Best Performance in Rates of Degree Production per FTE Student: 82,028

Total Degrees Produced 2005-25 If All of the Above: 849,543

Degrees Needed to Meet Best Performance (55%): 903,383

Source: 2005 ACS, PUMS
Savings If Oregon Reaches Top Performance in Degree Production

Performance: Undergraduate Degrees Awarded Per 100 Full-Time Equivalent Students

Reduced costs to Oregon would be $333 million by improving efficiency of degree production to level of top states.

- Additional Costs Needed to Meet Benchmark
- Current Budget Costs and Degree Production

<table>
<thead>
<tr>
<th></th>
<th>Public Two-Year</th>
<th>Public Four-Year</th>
<th>Cost to State Status Quo</th>
<th>Cost to State Best Performance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oregon</td>
<td>11.8</td>
<td>22.4</td>
<td>1,133</td>
<td>800</td>
</tr>
<tr>
<td>Top States</td>
<td>21.8</td>
<td>24.7</td>
<td>411</td>
<td>290</td>
</tr>
</tbody>
</table>

(In $ Millions)