Regional Economic Outlook
(and a little more)

NWCCC
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Western Washington University
Waycross Investment Management
Outline

• Construction in Context
  – Note: part of our job is to help with data and data analytics...

• Near term outlook

• Longer term trends
  – Technology and the unbundling of work (a proposed narrative)... and what it means in our region
Employment by Sector

Data from WA ESD: QCEW figures, 2015
Average Wage = $73,860 
(compared to overall average = $56,640)

Data from WA ESD: QCEW figures, 2015
## Construction Occupations

<table>
<thead>
<tr>
<th>Category</th>
<th>Percent of jobs</th>
<th>Average Salary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Laborers</td>
<td>50</td>
<td>$45,097</td>
</tr>
<tr>
<td>Supervisors</td>
<td>28</td>
<td>$77,215</td>
</tr>
<tr>
<td>Managers</td>
<td>14</td>
<td>$99,244</td>
</tr>
<tr>
<td>Inspectors</td>
<td>6</td>
<td>$70,395</td>
</tr>
<tr>
<td>All other</td>
<td>2</td>
<td>$47,211</td>
</tr>
</tbody>
</table>

“2016 Occupational Employment and Wage Estimates”: WA ESD (July 2016)
Age of Workers in Construction

Age of Workers in Prof & Tech Serv.

![Bar Chart]

**Age of Workers**

- 22-24
- 25-34
- 35-44
- 45-54
- 55-64
- 65-99

**Percent of Total**

- King
- Whatcom
Economic Outlook

Washington (2017)

• GDP growth: Roughly 0.5% above the US
• Employment (nonfarm): Also about 0.5 percent above the US
• Construction employment: Very slightly above the US

Note: much of the strength in the state (relative to other areas) has been based on activity in the Seattle metro area. The base is broadening.

More from Ken...
Population – Whatcom County

Source: Washington.REAProject.org
Data: Regional Income Division, BEA (11-17-2016)
Positive Near-Term Outlook in Our Region

Ignoring for a moment any political uncertainty (more from Kris), the pieces are in place for activity to remain strong in the construction sectors.

• Population growth average or above average
• Job growth and income growth continuing
• Difference by county – but much less so in construction than other sectors

Things to watch
– Labor constraints
– Weakness due to pricing and economic uncertainty (perhaps by end of the year?)
Percent change in jobs 2010 to Present

Data: Employment Security Department/Washington Employment Estimates
Percent change in jobs from before the recession

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Data: Employment Security Department/Washington Employment Estimates
Job Recovery After the Last Recession

Metro Size and the Great Recession

Employment Change Since Dec '07

- Metro with 1+ million pop.
- Metro with 250k - 1 million pop.
- Metro with <250k pop.
- Nonmetro

Data: QCEW, SA 3 MMA
Sources: BLS, USDA, Oregon Office of Economic Analysis
Percent Change in Employment (2007 to 2015)

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<th>Yakima</th>
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<td>-11.5</td>
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Average Wage

- **Info:**
  - Seattle: $174,000
  - B’ham: $51,879
- **Prof & Tech Services:**
  - Seattle: $96,540
  - B’ham: $62,598
A Theory

If you unbundle the activities in an industry, the value of different jobs becomes visible.

Tasks (jobs) can be relocated to where they make the most sense (select cities?)... and supply chains evolve.

The opportunity to use automation in specific areas become more clear.
If you unbundle the activities in an industry, the value of different jobs becomes visible. Tasks (jobs) can be relocated to where they make the most sense... and supply chains evolve.

The opportunity to use automation in specific areas become more clear:

- Some low value jobs are lost due to automation & some get reconfigured and go overseas
  - Things feel tenuous to many workers
- High value jobs may be collocated to take advantage of knowledge spillovers
  - Increasing inequality in economic activity (by place and $)
- Supply chains become much more complex fitting in between the various (unbundled) segments
The Narrative (take 2)

• “The World is Flat”, but technology favors cities at the present time
  – Cities are where people gather... and learn from each other

• Technology is better and cheaper
  – The value of and need for different types of labor is changing rapidly

• From ‘winner take all’ to faster disruption
  – Facebook & Netflix ... to construction

*Relationships are changing – especially between workers and output, but also between employer and employee*
Bio-chemistry and Health Care

A “Kodak moment” became a selfie...

Transportation (from fuel cell technology to self-driving cars)

Retail?
Smoothed Changes in Employment by Occupational Skill Percentile 1980-2005

 Autor and Dorn, 2008
**Employment Change 97 - 06**

<table>
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<th>Employment Category (white collar jobs)</th>
<th>% Change</th>
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<tr>
<td>High skilled</td>
<td>24.6</td>
</tr>
<tr>
<td>lawyers, engineers, etc.</td>
<td></td>
</tr>
<tr>
<td>Medium skilled</td>
<td>-30.1</td>
</tr>
<tr>
<td>computer support</td>
<td></td>
</tr>
<tr>
<td>Low skilled</td>
<td>1.5</td>
</tr>
<tr>
<td>sales rep, drafter, exec. asst.</td>
<td></td>
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</table>

Crino, Review of Economic Studies, 2010
... And Another View

NOTE: Shaded bars indicate National Bureau of Economic Research dated recessions.

Dallas Federal Reserve
“Not Even Hillary, Bernie or Donald Can Bring Back These Jobs”
Moshe Vardi, The Fiscal Times, 4/7/16
The Great Decoupling

US Productivity, Real GDP per capita, Employment and Income: 1947-2012

© Andrew McAfee, 2014

Source: research.aclufl.edu
A Stray Thought

Less friction in the economy, more opportunities with automation, etc. → more challenges planning for capital expenditures.

Strategic plans used to emphasize goals over a 3-5 year horizon and companies could focus on those goals (often with limited or no input from the customer... why bother?) Sometimes the idea was to optimize activities around a preferred forecast.

Companies now have to consider more information... and have to be able to respond to changes much more quickly than in the past.
- Faster execution is necessary, but has to be combined with constant assessment of everyday decisions and the ability to be flexible

“From a sprinter’s stance to a flexible stance” (From Bill Connerly)
And Another Stray Thought...

https://www.minneapolisfed.org/publications/special-studies/rip/recession-in-perspective
Summary & Discussion

• Positive economic outlook in the Puget Sound and North Puget Sound area
  – Seattle will remain stronger than other areas, but more rural areas doing better

• Technology matters
  – It currently favors cities (i.e., Seattle)
  – Also affecting construction directly, but probably less significantly than where customers are located
    • What are you seeing in construction with innovation and technological change? (Yard Club?)

• Capital investment decisions in a changing world
  – What are you seeing?
Thank You

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