

Economic Growth for Wisconsin

**Knowledge Based
Economy**

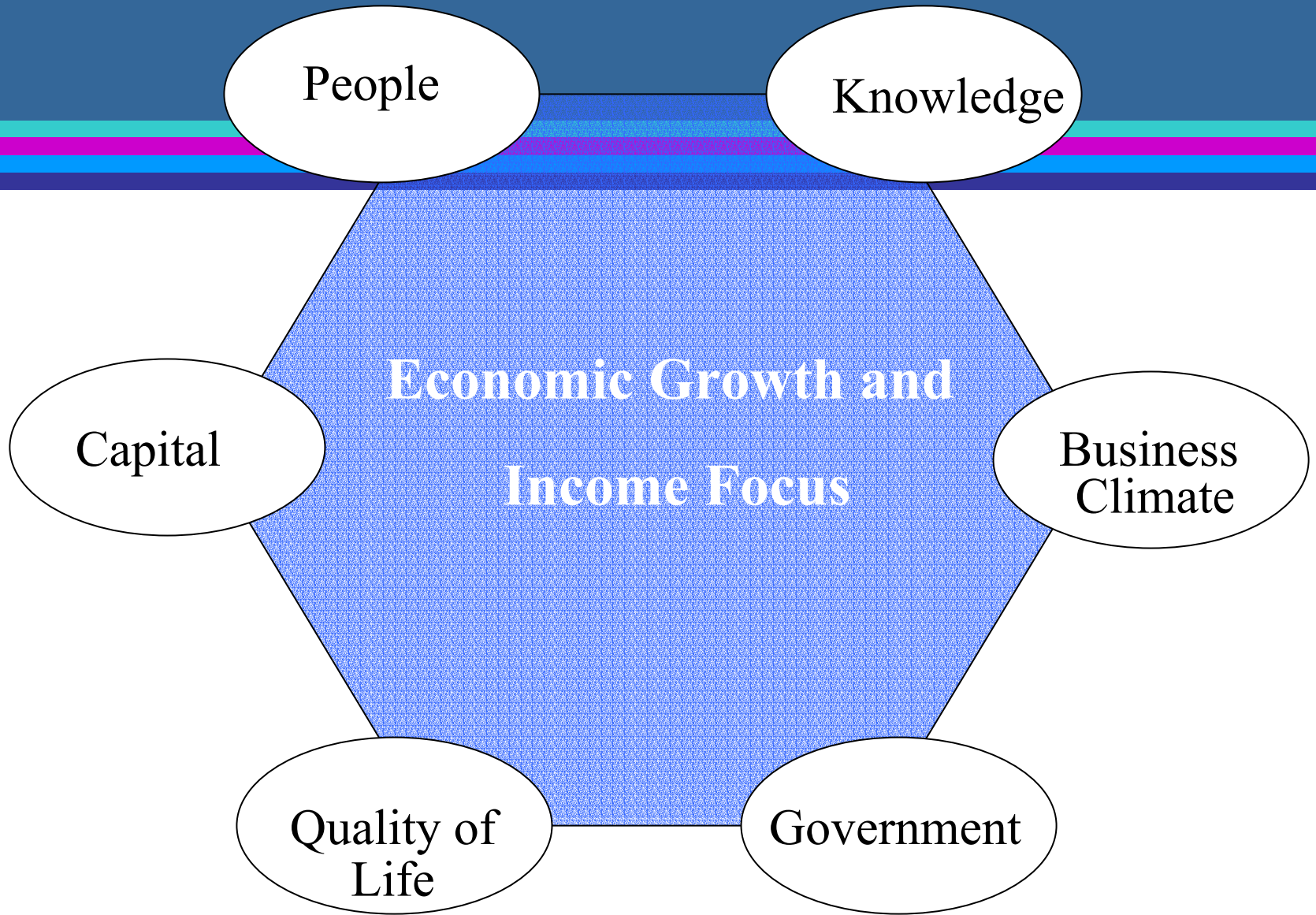
The New Economy Index

- **Knowledge Jobs - 35**
- **Globalization Score - 39**
- **Economic Dynamism - 46**
- **Digital Economy - 27**
- **Innovation Capacity - 29**
- **Overall state rank - 40**

Build WI - 4 Strategy Directions

- **Statewide Economic Growth**
 - Image, Tax Policy, Infrastructure, Innovation & Equipment Investment, Entrepreneurship & Venture Capital
- **Cluster Development**
 - Focus on key regional industries
- **Human Capital Formation**
 - Increase Educational Attainment, Improve Alignment between WD & ED, Increase In-Migration & Diversity
- **State & Regional Implementation Structure**
 - Primary Mission of All State Agencies, Regional Focus, Government Reorganization

Governor Doyle's Economic Priorities



What We Need

- Talented People
- Good Jobs
- Cool Places to Live

Talented People

- Knowledge, skills and talent are essential.
- Wisconsin will prosper only if the state can attract, retain, and grow knowledge-based workers with high-level skills.
- Education and training resources must be maximized through a collaborative and targeted focus.

Workforce Development Action Examples

- *San Diego Workforce Partnership* - strategic plans for the workforce needs of region's key industry clusters.
- *Three Rivers WIB* in PA - conducted regional industry cluster forums on attracting, training, and retaining workers in five key areas.
- *The State of Washington* - developed a 4-stage RFP to reflect sequential stages of workforce development focused on key industry sectors.

Improve Alignment of Workforce Development and Economic Development

- Council on Workforce Investment – Support the state’s economic growth.
- HealthCare Workforce Public/Private Partnership - A model for how a targeted cluster can work.
- Local Workforce Development Boards – Align with E/D to meet the needs of regional Industrial Clusters.
- Apprenticeship Program – Expand efforts in areas to support targeted industry clusters.

Alignment continued...

- Incorporate economic growth strategies into Strategic Plans.
- Develop future model grants in partnership with economic development.
- Work with educational partners to address brain drain and raise the adult educational levels.

Increase Support of Training in High-skill, High-wage Jobs

- Revise policies to target industrial clusters.
- Target high-wage and high-skill training in specific clusters.
- Increase emphasis on incumbent worker skill upgrades.

Knowledge Jobs & Innovation Capacity *(New Economy Index)*

	State Rank
Knowledge Jobs	35
Information Technology Jobs	31
Managerial, Professional & Technical Jobs	43
Workforce Education	25
Education Level of the Manufacturing Workforce	11
Innovation Capacity	29
High-Tech Jobs	31
Scientists and Engineers	34

Postsecondary Education Levels

	USA	WI	WI Rank
Any Post-Sec	51.8%	50.5%	33
Some college, no degree	21.0%	20.6%	27
Associate Degree	6.3%	7.5%	9
Bachelor's Degree	15.5%	15.3%	29
Grad. or Prof. Degree	8.9%	7.2%	36
Bachelor's Degree or Higher	24.4%	22.4%	30

Census 2000

Talented People

“Mortarboards, Paychecks and Crystal Balls”

- In 2000, only 16 percent of all jobs in Wisconsin typically required a college degree, compared to 21 percent nationally.
- Year 2000 figures show 20 percent of Wisconsin’s jobs are in professional and technical occupations. This is below the national average of 22 percent.
- In 1980, less than 20 percent of jobs, nationally, were with services industry employers, compared to 31 percent in 2000. Wisconsin’s growth in services industries has been slower than national average and ranks low among the peer-states.

Talented People

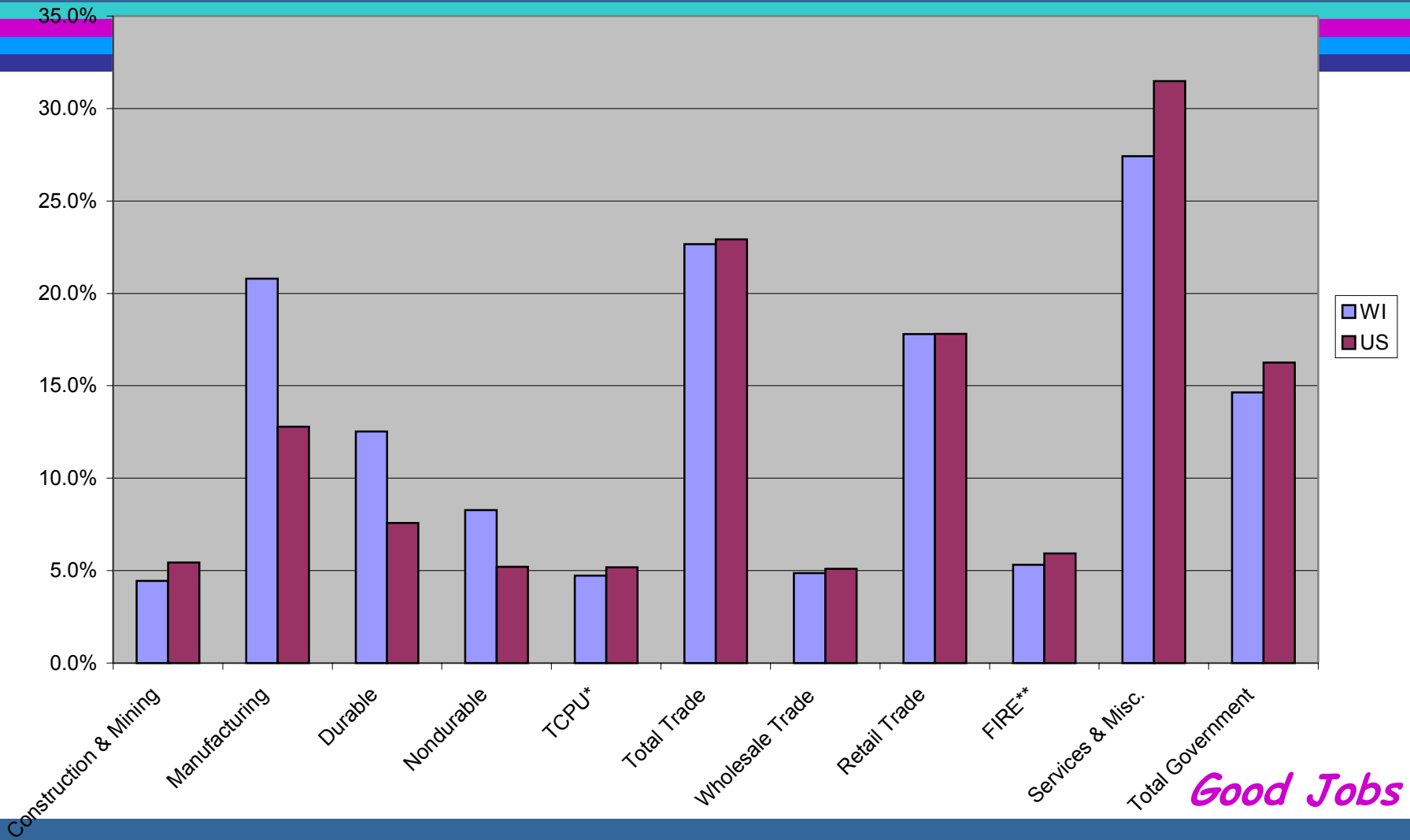
Mortarboards, Paychecks and Crystal Balls

- Wisconsin has continued to add manufacturing jobs since the 1980's, accounting for 10.2 percent of total jobs added from 1990 to 2000.
- 70% of manufacturing jobs are primarily in production occupations with less than 10% in professional and technical occupations, whereas 37% of the services industry jobs are in professional and technical occupations.
- Wisconsin has a greater than average share of production jobs and a lower ratio of professional or technical occupations than the national average.

Talented People

Wisconsin's Current Economy

Industry as a percentage of total nonfarm employment



Good Jobs

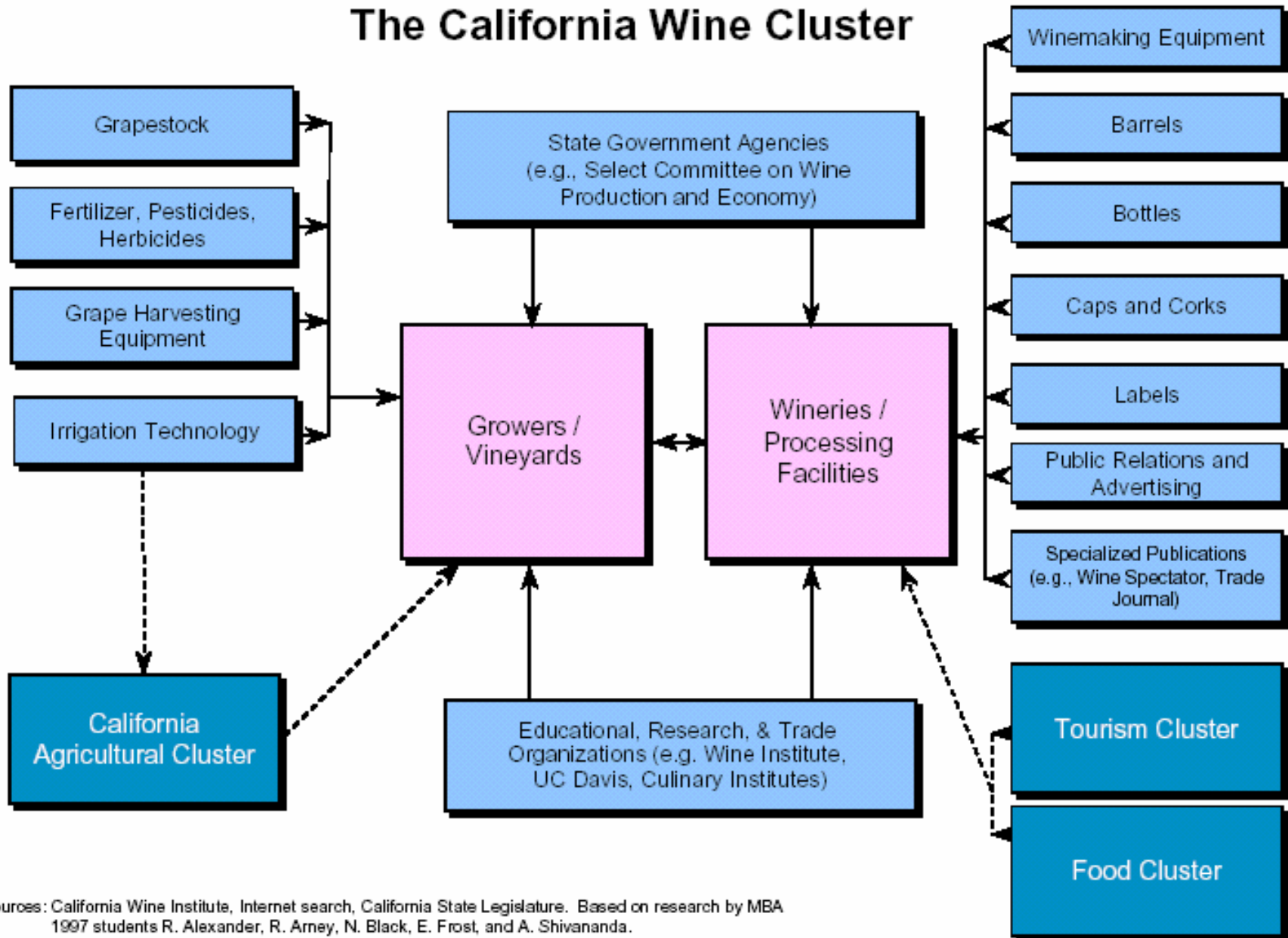
WI Industry Clusters

- **Biotechnology**
- **Paper**
- **Printing**
- **Manufacturing**
- **Medical Devices**
- **Plastics**
- **Food Processing**
- **Transportation**

A geographic industry concentration or “cluster” of ...

- interconnected companies,
- specialized suppliers,
- service providers,
- and associated institutions,
- that are present in a region.

The California Wine Cluster

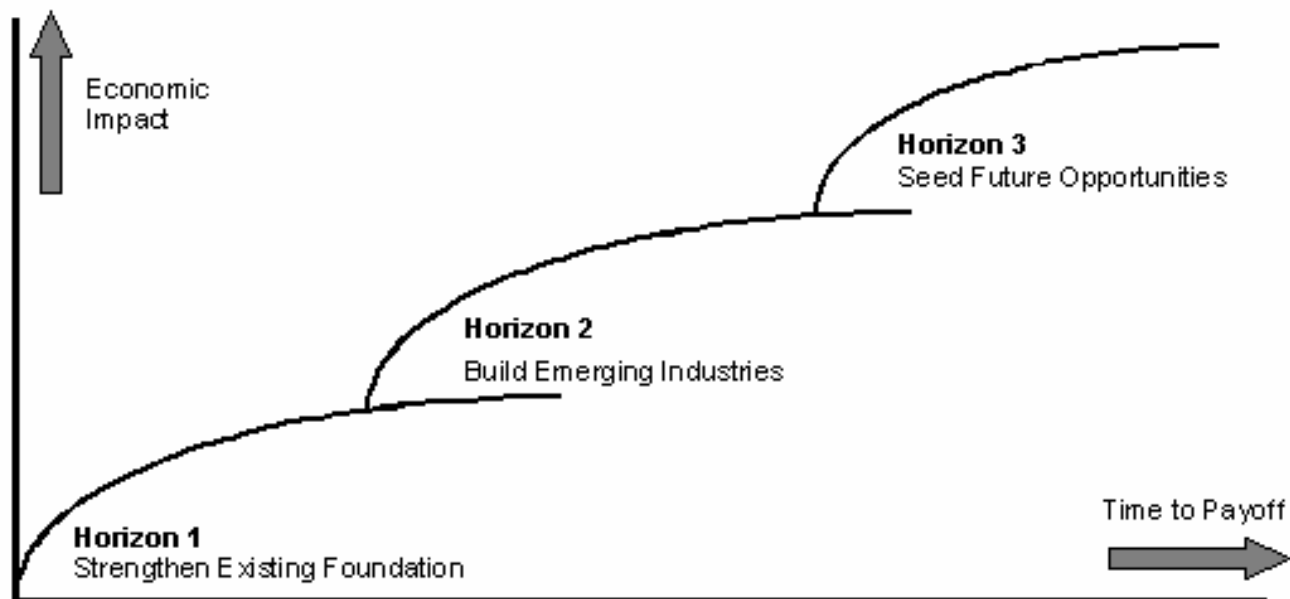


Sources: California Wine Institute, Internet search, California State Legislature. Based on research by MBA 1997 students R. Alexander, R. Arney, N. Black, E. Frost, and A. Shivananda.

With a goal of collaborative action to...

- **Improve productivity** - access to specialized suppliers, skills, information, training and technology
- **Foster innovation** - new products, new processes and meeting new needs with a full range of local suppliers and research institutions
- **Facilitate commercialization of innovation** - new firms via start-ups, spin-offs, and new business lines with needed inputs such as banks and venture capital

Industry Concerns at Various Stages of Development



Industry Examples	Manufacturing, Agriculture	Biotech, Information technology	Future Technologies
Key Concerns by Stage	<ul style="list-style-type: none"> ▪ Modernizing to improve productivity ▪ Retaining high wage jobs ▪ Streamlining taxes and regulations ▪ Training and retraining current workers ▪ Protecting the environment (especially for agriculture, tourism) ▪ Improving infrastructure 	<ul style="list-style-type: none"> ▪ Supporting knowledge creation and transfer ▪ Attracting seed and venture capital ▪ Offering unparalleled quality of life ▪ Retaining graduates & ending brain drain ▪ Working in partnership with emerging clusters ▪ Modeling government after economy we seek 	<ul style="list-style-type: none"> ▪ Investing in education ▪ Supporting knowledge creation and transfer ▪ Attracting seed capital and SBIR/research funding ▪ Offering unparalleled quality of life ▪ Encouraging entrepreneurial activity and climate

Technology Clusters and High-Tech Research Centers of Excellence

Vision 2020 - A Model Wisconsin Economy

- Potential Knowledge-Based Clusters
 - Healthcare
 - Workforce Education
 - Media & Design
 - Information & Data Management
- High-Tech Research Centers of Excellence
 - Tissue regeneration
 - Personalized medicine
 - Error-free hospitals
 - Genetically Modified Organisms
 - Zoonotics Disease Control
 - Small Molecule Pharmaceuticals
 - Intelligent Networks
 - Mass Data Storage
 - Nanometric systems
 - Computing & Communications
 - Extreme Materials
 - Homeland Security

Good Jobs

Entrepreneurs

- Economic Dynamism - Rank 46
New Economy Index
- Entrepreneurial Vitality - Rank 47
Corporation for Enterprise Development

Facts ...

- CEOs of major corporations are becoming younger.
- In 1917, entrepreneurs began at an average age of 40.
- In 1997, the average age had dropped to 26.5 years.
- 4 of 5 new businesses started by Gen X'ers.

Promote Entrepreneurship as a Career Option

- Involve youth in entrepreneurship through summer camps and school-based activities.
- Develop business plan competitions.
- Communicate the contribution that entrepreneurship makes.
- Expose potential entrepreneurs to a variety of mentors and role models.
- Encourage successful entrepreneurs to give back.

Cool Places to Live

- “Once upon a time there was a new generation of talent who placed as much value on where they lived as where they worked.
- Asked to choose between 25 years of workaholism in return for gobs-o-cash and a corner office, OR living in a diverse, progressive community with oodles of occupational options, today's young talent pick "B," thank you very much.
- Hot Jobs - Cool Communities is a report card of the hippest places to live and work based on the metrics that matter to a new generation of talent.”

Rebecca Ryan Next Generation Consulting

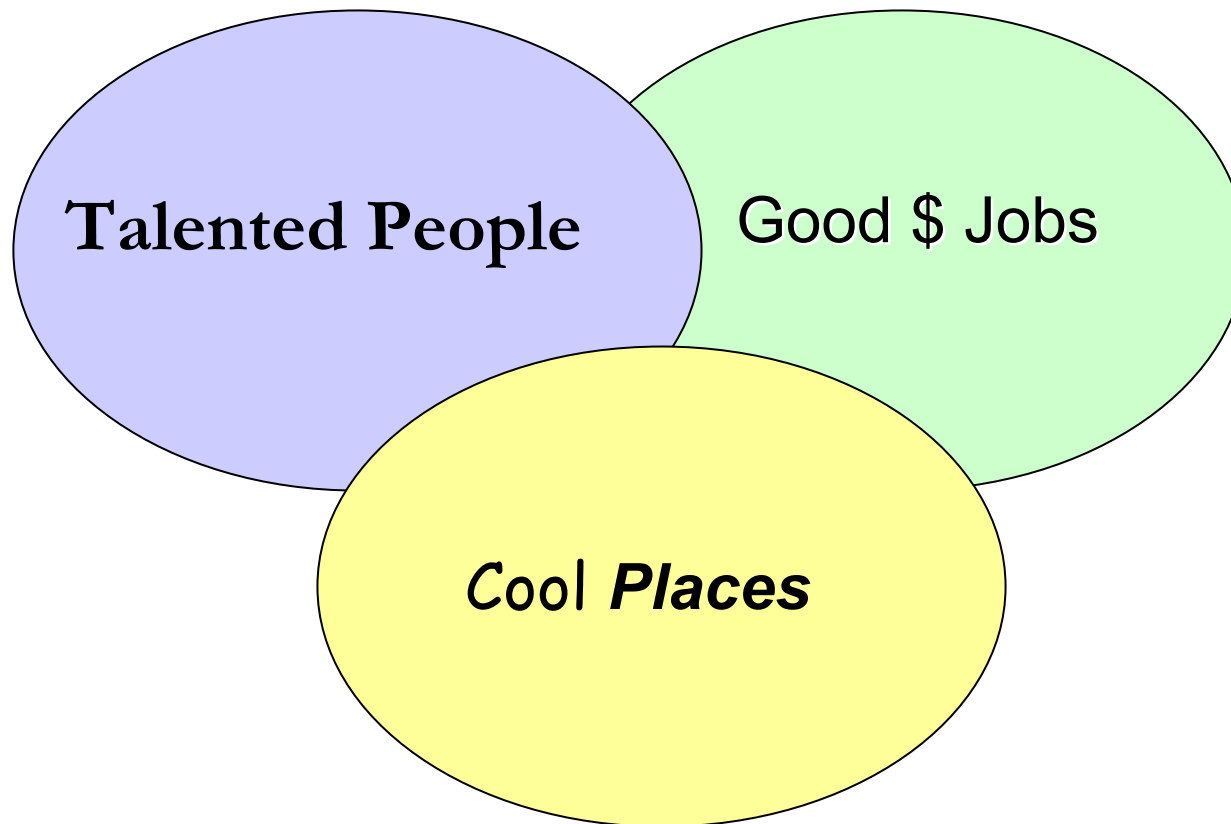
<http://www.hotjobs-coolcommunities.com/>

Cool Places to Live

Region	Rank in Size Class	Overall Rank	Creative Class	High-Tech	Innovation	Diversity
1. Milwaukee	35	56	111	61	38	128
2. Madison	1	20	19	89	14	38
3. Appltn-Oksh-Neenah	27	118	185	157	15	156
4. Eau Claire	22	123	91	160	58	219
5. Duluth-Superior	42	164	104	115	156	249
6. LaCrosse, WI-MN	43	164	77	191	95	260
7. Green Bay	45	168	159	197	112	165
8. Janesville-Beloit	78	216	162	256	86	253
9. Sheboygan	92	231	248	236	63	256
10. Wausau	108	252	191	263	195	239
Over 1 m – 49 regions 250-500k – 63 regions Under 250k – 124 regions Total 268 regions						

Excerpt from - Richard Florida - *The Rise of the Creative Class*

What We Need



Resource Information

- New Economy Index
 - <http://www.neweconomyindex.org>
- Mortarboards, Paychecks and Crystal Balls
 - http://www.dwd.state.wi.us/lmi/pdf/mortarboards_wages1002.pdf
- Harvard's Institute for Strategy and Competitiveness
 - <http://www.isc.hbs/index.html>
- WI Dept. Of Commerce - Industry Cluster Page
 - <http://www.commerce.state.wi.us/MT/MT-IndustrialClusters-Home.html>
- Vision 202 - A Model Wisconsin Economy
 - <http://www.wisctec.com/vision2020.htm>
- Hot Jobs - Cool Communities
 - <http://www.hotjobs-coolcommunities.com/>

Source

Department of Workforce Development