



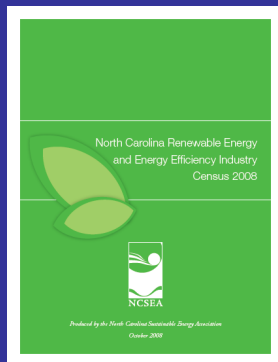
The Importance of Manufacturing in the NC Green Economy

Paul Quinlan
NC Sustainable Energy Association

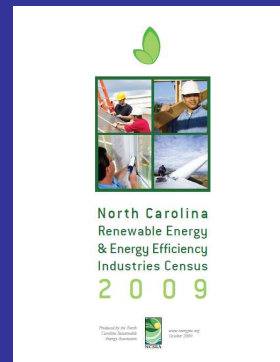
Raleigh, NC
April 20, 2010



Background



NC RENEWABLE ENERGY AND
ENERGY EFFICIENCY INDUSTRY
CENSUS 2008



NC RENEWABLE ENERGY AND
ENERGY EFFICIENCY INDUSTRIES
CENSUS 2009



Key Findings - 2009

- Industries employ 10,250 full-time equivalent (FTE) employees
- Despite rising unemployment, respondents report 6% increase in jobs since July 2008
- Firms report a presence in all 100 North Carolina counties
- Industries generate over \$3.5 billion in revenue from NC activities



Employment

Reported Jobs by Most Important Type of Business (n=519), 2009

Most Important Type of Business	# Responding Firms	% Responding Firms	# Reported Jobs	Avg. Reported Jobs	% Reported Jobs
Research and development	38	7%	985	25.9	18%
Manufacturing	36	7%	1,287	35.8	23%
High performance building or retrofits	205	39%	1,150	5.6	20%
Renewables retailer or distributor	32	6%	193	6.0	3%
Renewables installer, designer, or developer	91	18%	766	8.4	14%
Power generation facility owner or operator	26	5%	373	14.3	7%
Education, services and consulting	91	18%	870	9.6	15%
TOTAL	519	100%	5,624	10.8	100%



Employment

Net Job Change By Most Important Business Type (n=508), 2009

Most Important Type of Business	# Reported Jobs	Net Job Change Over Past 12 Mos.	% Growth Over Past 12 Mos.	Net Job Change Over Next 12 Mos.	% Growth Over Next 12 Mos.
Research and development	980	113	13%	221	23%
Manufacturing	1,285	-281	-18%	148	12%
High performance building or retrofits	1,145	-21	-2%	299	26%
Renewables retailer or distributor	193	47	32%	353	183%
Renewables installer, designer, or developer	756	163	27%	523	69%
Power generation facility owner or operator	295	55	23%	62	21%
Education, services and consulting	865	216	33%	396	46%
TOTAL	5,519	292	6%	2,002	36%



Implication

Conclusion:

Manufacturing is a major, but struggling, component of the supply chain that is not achieving its full potential

Policy Responses?

1. Implementation of NC REPS
 - Supply chains follow development

2. Sustainable energy manufacturing tax credit
 - Reintroduced in 2009 – see HB512 Edition 2
 - Tax credit against income or franchise tax
 - Applies to construction, expansion, & retooling of facilities
 - Technologies: renewable energy, fuel cells (from renewable resource), and energy efficiency (CHP & geothermal)
 - Includes end products and components (75%)



Thank you.

“The green economy is red hot.
Green is gold in North Carolina.”

- Governor Beverly Perdue, Sept 30, 2009