

# MINNESOTA'S

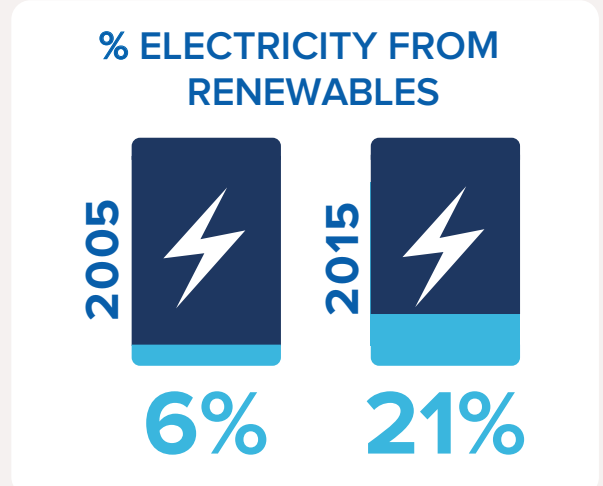
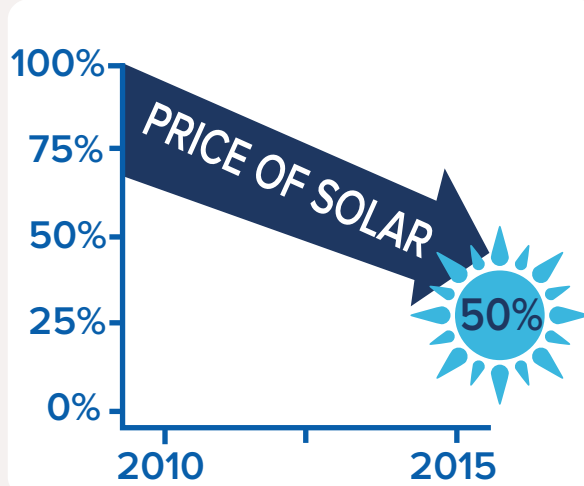
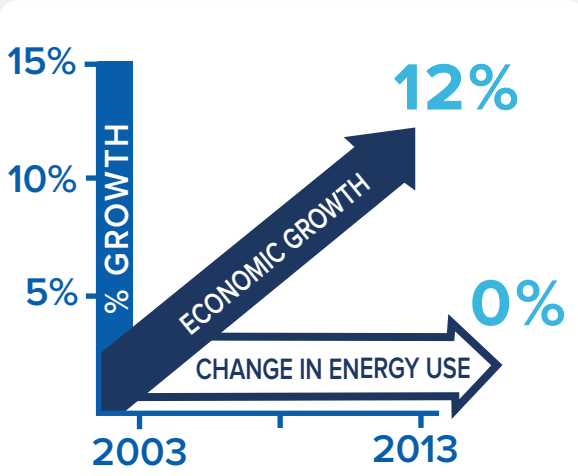
## 2025 ENERGY ACTION PLAN

Stakeholder-Driven Strategies for Success



### 1

#### THE ENERGY LANDSCAPE IS RAPIDLY CHANGING



### 2

#### MOMENTUM TOWARD CLEAN ENERGY IS ALREADY BUILDING

##### MINNESOTA



##### FROM 1997 to 2012

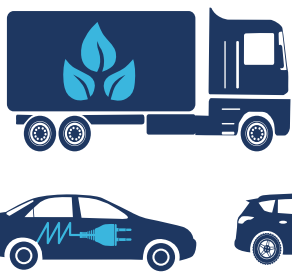


MINNESOTANS HAVE SAVED OVER 56 TRILLION BTUs OF ELECTRICITY & NATURAL GAS



### 3

#### ACTION PLAN STRATEGIES ACCELERATE GROWTH IN 5 AREAS



**TRANSPORTATION**  
Electric vehicles and alternative-fuel vehicles



**ENERGY SUPPLY & GRID MODERNIZATION**  
Smart meters and smart inverters, storage, updated pricing and programs



**EFFICIENT BUILDINGS & INTEGRATED ENERGY SYSTEMS**  
Low-energy design, efficient operations, thermal energy integration



**INDUSTRIAL & AGRICULTURAL PROCESSES**  
Advanced biofuels, business leadership on energy



**LOCAL PLANNING & ACTION** Coordinated energy and resilience planning, adopting best practices

### 4

#### STAKEHOLDERS WHO WILL CONTRIBUTE TO CAPTURING THIS VALUE



LOCAL GOV'T LEADERS



UTILITIES



BUSINESSES



NONPROFIT ORGANIZATIONS



STATE AGENCIES



EDUCATIONAL INSTITUTIONS

1 a. "Real Total Gross Domestic Product for Minnesota," Federal Reserve Bank of St. Louis, 2015, <https://research.stlouisfed.org/fred2/series/MNRGSP>

1 a. "Primary Energy Consumption Estimates, 1960-2013, Minnesota," U.S. Energy Information Administration, 2015, [http://www.eia.gov/state/seds/data.cfm?infile=/state/seds/sep\\_use/total/use\\_t\\_MNcb.html&sid=MN](http://www.eia.gov/state/seds/data.cfm?infile=/state/seds/sep_use/total/use_t_MNcb.html&sid=MN)

1 b. Galen Barbose and Naim Darghouth, Tracking the Sun VIII, Lawrence Berkeley National Laboratory, August 2015, [https://emp.lbl.gov/sites/all/files/lbnl-188238\\_1.pdf](https://emp.lbl.gov/sites/all/files/lbnl-188238_1.pdf)

1 c. "21 percent of Minnesota's electricity came from renewables in 2015," Minnesota Department of Commerce, March 3, 2016, <http://mn.gov/commerce/media/news/index.jsp?id=17-156648#/list/appl/filterType/filterValue/page/sort/order/>

2 a. "Minnesota State Profile and Energy Estimates," U.S. Energy Information Administration, March 17, 2016, <http://www.eia.gov/state/?sid=MN#tabs-2>

2 b. John Melville, Renae Steichen, and Janina Kaiser, Minnesota Clean Energy Economy Profile, prepared by Collaborative Economics, Inc. for Minnesota National Governors Association, October 2014, [http://mn.gov/deed/images/mn\\_cleanenergy-economy-profile-fullreport.pdf](http://mn.gov/deed/images/mn_cleanenergy-economy-profile-fullreport.pdf)

2 c. Frank Jossi, "A year after launch, community solar picking up pace in Minnesota," Midwest Energy News, December 11, 2015, <http://midwestenergynews.com/2015/12/11/a-year-after-launch-community-solar-picking-up-pace-in-minnesota/>