Digest of Green Reports and Studies

	Managing Greenhouse Gas Emissions in California – The California Climate Change Center at UC Berkeley
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	Authors: Kammen et al
Organization	California Climate Change Center, UC Berkeley and San Diego
Author Contact	NA
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Summary	 On June 1, 2005, recognizing and responding to dangers posed to California by climate change, Governor Schwarzenegger signed Executive Order # S-3-05 (Schwarzenegger 2005). The Executive Order established the following GHG emission reduction targets for California: by 2010, reduce GHG emissions to 2000 levels; by 2020, reduce GHG emissions to 1990 levels; and, by 2050, reduce GHG emissions to 80 percent below 1990 levels. Using the Berkeley Energy and Resource Model (BEAR), an economy- wide forecasting tool, the team analyzed eight strategies in detail, tracing complex market interactions across key elements of the California economy. This study includes eight independent reports assembled by two dozen experts to evaluate the economic implications of the Executive Order. It concludes that: Climate action in California can yield net gains for the state economy, increasing growth and creating jobs. Preliminary modeling indicates that just eight policies that were analyzed in detail can achieve almost half of the Governor's 2020 targets while increasing Gross State Product by about \$60 billion and creating over 20,000 new jobs. There are numerous additional climate action initiatives beyond those that have been modeled, many of which will also improve California's economy. The analysis thus far indicates that California can likely reach the Governor's 2020 targets with a net gain for the state economy. Voluntary measures, while helpful, are insufficient to yield the required reductions. Designing an effective combination of regulatory standards, market-based approaches (such as a well-designed cap-and-trade program) and innovation policies is the best way to cost effectively manage greenhouse gas emissions in California. Technology innovation, spurred by a combination of regulations and incentives, will be needed to shift the economy over the long term away from carbon-based fuels and meet the 2050 targets. Report

	This report corroborates the state's recent findings that the governor's
	targets can be achieved with net economic benefits, increasing growth
	and creating jobs.
	The report concludes that "just as Silicon Valley gained economically from being the leader in the Internet revolution, so, too, will California gain an economic advantage from being the leader in the new technologies and the new industries that will come into existence worldwide around the common goal of reducing GHG emissions."
Key Findings	Key findings are discussed on each of the eight individual reports, either as Key Findings or Conclusions.
	Overall, the aggregate economic benefits of the eight policies analyzed here outweigh their costs. These results indicate the economic importance of indirect and linkage effects, which in this case tend to raise the economic benefits overall.
	Many GHG policies reduce energy use, which lowers spending on energy and allows the savings to be used on goods and services produced in California, increasing economic growth and employment. Furthermore, some of the spending that has been re-allocated to in-state use will be used to increase productivity through new investment and education. This effect will be compounded by state policies that promote the technological innovation and the use of new technologies. Because of our long experience with productivity growth in California, we know these benefits can transmit themselves across the entire economy.
	increasing competitiveness, profitability, and the standard of living.
Recommendations	By acting now, California can gain a competitive advantage by becoming
	a leader in the new technologies and industries that will come into
	existence worldwide due to the common goal of reducing GHG emissions.
Definition of "Green"	NA
Methodology	Policy Analysis
Data Sources Cited	32 pages of data sources cited. Link to original report to view.
Report Geography	California, UC Berkeley, and San Diego
Green Occupations	Research and Development and Demonstration Occupations to create
Cited	new technologies and innovations that reduce greenhouse gas
	emissions. (no occupational titles specified – only large occupational families)
Green Industries	Agriculture, Energy sector, GHG-intensive industries
Keywords	Greenhouse gas emissions: climate policies: climate: executive order
Legislation Cited	Executive Order # S-3-05
Bibliography (Y/N)	Υ
Reviewer	Mocan, D. – State of California
Name/Org	

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