Salt Lake City's Local Climate Action Plan: Real Actions, Real Results, No Excuses

Salt Lake City Mayor Ross C. "Rocky" Anderson

When President George W. Bush decided to renege on campaign promises and pull out of international climate protection negotiations, the United States needed new leadership to stop global warming. In Salt Lake City, we've committed to show, on a local level, that the goals of the Kyoto Protocol can be reached in the United States, and demonstrate that committed, practical, and foresighted Americans will work with the rest of the world to ensure the stability of the world's climate.

LOCAL CLIMATE ACTION PLAN

- Part of our comprehensive environmental program, Salt Lake City Green
- Goal: meet the standards set in the Kyoto Protocol
  —Prove that the US can join the world in combating global warming
- Phase 1: Government
  —Step 1: analysis of baseline and current initiatives
  —Step 2: more action
- Phase 2: Community
  —Step 1: analysis of baseline and current initiatives
  —Step 2: more action

Because climate protection is a complex and multi-layered task, Salt Lake City needed to divide our goal into two phases.

Phase 1 tackles the goal of bringing Salt Lake City government operations up to the standards of the Kyoto Protocol. A critical part of this phase was to implement a means for establishing a baseline and to monitor our progress.

> Phase 1 has positioned Salt Lake City government to assist other cities in our region and nationally to take similar climate protection actions.

Once we have set our municipal-operations house in order, which we are close to accomplishing, Phase Two will take on the task of broadening our efforts to apply them to the entire community, with in-depth, quantitative analysis of every source of greenhouse gas.

CLIMATE CHANGE AND AIR QUALITY

"DOWN IN SALT LAKE, THEY HAVE A PRETTY BIG SMOG PROBLEM."

Jonny Moseley, Olympic Gold Medallist, on David Letterman after the 2002 Winter Olympic Games

---

Ross C. "Rocky" Anderson (D) was born in Logan, Utah, and has lived in Salt Lake City most of his life. He earned a Bachelor of Science degree from the University of Utah and a law degree from George Washington University. He practiced law for twenty-one years before being elected in 1999.

This speech was presented at the 8th Conference of the Parties (COP8) to the United Nations Framework Convention on Climate Change (October 28, 2002) in New Delhi, India.

Another major benefit of our actions to reduce greenhouse gas emissions is the benefit to air quality.

Although surrounded by some of the most pristine wilderness anywhere, Salt Lake City faces serious air quality issues. This summer alone, we had a record 15 days of poor air quality warnings.

In our region the urban pollution problem is compounded by a winter temperature inversion that traps pollutants in the valley and creates a serious health risk for valley residents. Not only is public health at risk; poor air quality is damaging to economic development.

The measures taken under the Salt Lake City Local Climate Action Plan will improve our air quality, create greater opportunities for economic development, and serve the international community by reducing our contribution to global warming.

MAJOR SALT LAKE CITY GOVERNMENT CLIMATE PROTECTION INITIATIVES

- High Performance Buildings Initiative
- Energy efficiency retrofits
- Renewable energy sources
- Alternative fuel vehicle fleet and right-sizing
- Corporate recycling
- Methane recovery at the landfill and water treatment plants

In Salt Lake City, local government does not encourage citizens to take any actions regarding climate protection the municipal government is unwilling to take itself. Projects that are part of Phase 1 will set standards for responsible growth and resource use in Salt Lake City in the future.

Our High Performance Buildings Initiative has created practical guidelines to promote the construction and retrofit of buildings designed for high performance and efficiency.

All buildings constructed by the City or using city funds will adhere to guidelines designed to conserve energy, water and material resources, and utilize materials produced in an environmentally responsible manner.

New lighting retrofits at our city hall eliminated hundreds of tons of greenhouse gas emissions, while saving taxpayers more than $33,000.

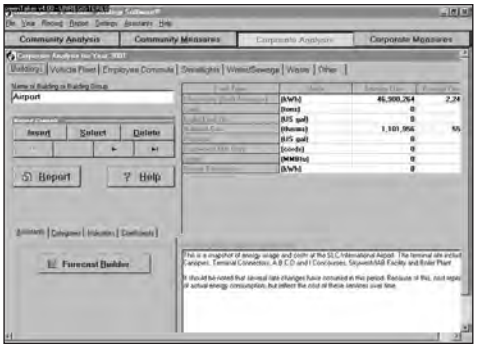
By reinvesting a portion of this money in pollution-free wind energy, Salt Lake City was able to make the largest purchase of wind power in Utah. All of this is accomplished without any net increase in expenditures and with a combined decrease of 559 Tons of equivalent CO_2.

My personal car runs on clean natural gas and, according to EPA standards, is 97% cleaner than the gasoline model of the same type. Converting our municipal fleet to alternative fuel vehicles has been a high priority program that was kicked off this year with 5 natural gas capable cars. We are also reevaluating our fleet to make sure the size of the vehicle reflects the use.

With a new city-wide recycling program, we have been able to increase the amount of material being recycled in Salt Lake City by more than 60%.

Finally, we are going to install methane recovery and cogeneration technologies at our city land fill and water treatment plants.

CLIMATE PROTECTION SOFTWARE FROM THE INTERNATIONAL COUNCIL FOR LOCAL ENVIRONMENTAL INITIATIVES



- Baseline Data
- Emissions Target
- Emissions Projections
- Quantification of Measures
- Monitoring and Reporting

We cannot determine if we are meeting our commitment to the Kyoto Protocol without the ability to establish a baseline emissions inventory and monitor our progress.

Salt Lake City has found the Cities for Climate Protection "Climate Protection Tool Kit" and "Climate Protection Software" invaluable to the implementation and success of our action plan.

To use the software tool, Salt Lake City input information regarding the amount of electrical and natural gas consumption, vehicle fuel use, and the cost of using these resources during 2001.

The software returns specific and accurate information on carbon dioxide, nitrogen oxide, sulfur oxide, carbon monoxide, Volatile Organic Compounds, and particulate

matter (10) emissions. With this information, Salt Lake City is able to monitor our emissions in a efficient and reportable manner.

2001 SALT LAKE CITY GOVERNMENT BASELINE EMISSIONS INVENTORY

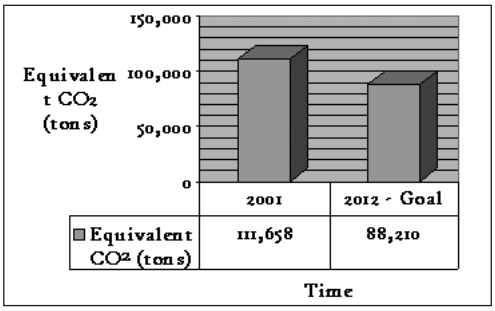
Energy Sectors	Equiv. CO^2 (tons)	Energy (million Btu)
Buildings	68,985	333,033
Vehicle Fleet	18,134	215,746
Employee Commute	494	5,781
Water/Sewage	24,496	182,366
TOTAL 2001	111,658	736,927

Due to technological upgrades, data going back to 1990, the baseline year under the Kyoto Protocol, is extremely difficult and expensive to retrieve from our local utilities. Instead, data from 2001 was used to determine our emissions baseline.

According to the calculations of the climate protection software, Salt Lake City government operations resulted in the emission of 111,658 tons of equivalent CO_2 in 2001.

SALT LAKE CITY GOVERNMENT GREENHOUSE GAS REDUCTION GOAL

Meet or exceed the 7% reduction target (from 1990 levels) for the USA as outlined in the Kyoto Protocol.



(21% reduction in greenhouse gas emissions from baseline 2001.)

According to the US EPA, emissions grew in the United States by 14% from 1990 – 2000. Based on this estimate, Salt Lake City must reduce our 2001 emissions level by 21% to reach our our goal.

In real numbers, based on our 2001 inventory, Salt Lake City can meet the reduction goal described for the U.S. in the Kyoto Protocol if its operations do not cause more than 88,210 tons of equivalent CO_2 emissions in 2012.

2002 SALT LAKE CITY GOVERNMENT AIR QUALITY IMPROVEMENTS

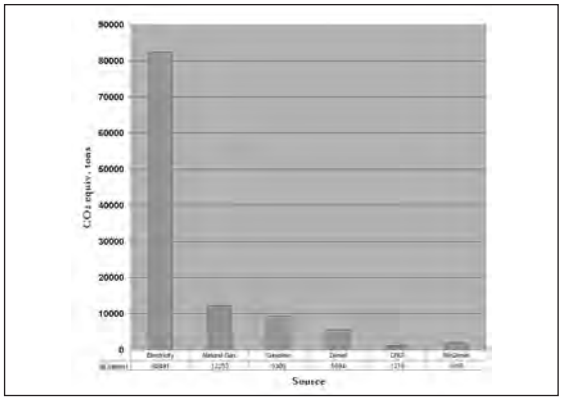
2002 measures have reduced criteria pollutants related to poor air quality

Pollution Reduction Measures	Nox (lbs.)	Sox (lbs.)	CO (lbs.)	VOC (lbs.)	PM10 (lbs.)
Lighting upgrades	795.2	713.1	425	46.9	305.4
Wind power	497.5	446.1	265.9	29.3	191
681 LED traffic signals	557.7	500.1	298.1	32.9	214.2
Biodiesel airport fleet	-346	112	1,153	118	132
TOTAL 2001	1,504.4	1,771.3	2,142	227.1	842.6

The previous version of the climate protection software did not include any measurement of criteria air pollutants. However, because of the obvious link between poor air quality and global warming, this data is necessary for a city to determine priority projects that have the greatest impact on improving air quality, while making progress on greenhouse gas reduction goals.

MAKING IT REAL: QUANTITATIVE ANALYSIS

Salt Lake City Government's Top Three:
Electricity, Natural Gas, and Gasoline



Once we know our baseline greenhouse gas emissions, we must understand the sources of these emissions in order to most appropriately prioritize and implement projects.

The most significant figure on this graph relates to electricity. Electric energy in our region comes almost entirely from coal. Any actions Salt Lake City can take to reduce the amount of energy we consume, or to utilize alternative energy sources, will greatly reduce our impact on global warming and improve our regional air quality.

Next to electricity, our top offenders are natural gas and gasoline.

Initiatives underway, such as High Performance Buildings, energy efficiency upgrades, and an alternative fuel vehicle fleet will have a major impact on our emissions and MUST be priority projects to reach our emissions goal.

2002 SALT LAKE CITY GOVERNMENT CLIMATE PROTECTION MEASURES

2002 Emissions Reduction Measures	Equiv. CO^2 (tons) Reduced	Cost Savings
Lighting efficiency retrofits	344	$33.571
Blue Sky wind power purchase	215	
Installation of 861 LED traffic signals	242	$32.962
B20 biodiesel fuel at airport	227	
TOTAL	1,028	$66,533

Although our climate protection plan is not even a year old – we are already (within the first 6 months to a year of implementation) seeing impressive greenhouse gas reductions and monetary savings.

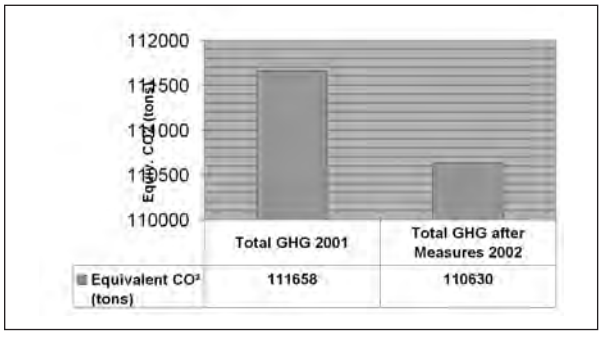
This year, the four measures listed here will reduce CO_2 emissions by 1,028 tons.

These measures represent only a fraction of the reductions we expect to see when our High Performance Building Guidelines are fully implemented, and we have achieved a 100% fleet conversion on all vehicles capable of running on alternative fuels.

One of the most impressive accomplishments of our four initiatives listed here so far is that these greenhouse gas reductions have come at no extra cost to the taxpayer.

2002 SALT LAKE CITY GOVERNMENT GREENHOUSE GAS EMISSIONS REDUCTIONS

2002 measures have reduced corporate emissions by 1,028 tons of CO_2.



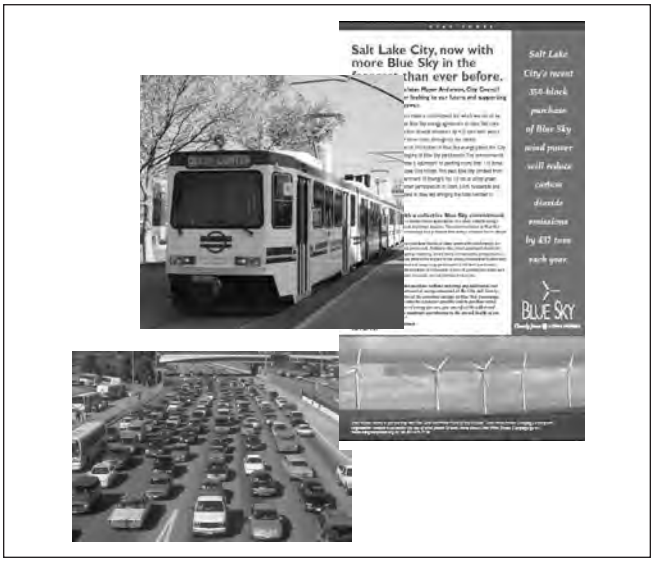
(4.5% of –23,448 tons CO_2 reductions necessary to meet goal)

The 1,028 ton reduction in greenhouse gas emissions this year is equal to 4.5% of the CO_2 reductions needed to attain our goal by 2012.

In less than a year, and without yet quantifying many of the government measures currently underway, Salt Lake City is working hard to make certain our phase 1 projects will help us achieve our Kyoto goal.

Salt Lake City has several projects underway that reduce greenhouse gas emissions and improve air quality city-wide. In phase 2 we will establish a community baseline emissions inventory and begin monitoring emissions reductions from these projects.

MAJOR COMMUNITY CLIMATE PROTECTION INITIATIVES



- Mass transit
- Transit-oriented development
- Community recycling program
- e2 Businesses ("green" business)
- Public outreach for energy efficiency and renewable energy programs
- Fighting sprawl and unnecessary highway projects

Listed here are some of the major community projects we are working on.

One of our highest priorities is to expand mass transit, decreasing automobile dependence. Salt Lake City now has light rail access on north/south and east/west routes through much of the valley. The tremendous success of light rail in Salt Lake City has created an increasing demand for extensions to cities throughout our region.

The expansion of residential recycling has increased city-wide recycling by over 60%.

E2 businesses is a budding initiative to recognize and promote businesses that excel both in environmental protection and economic welfare. Businesses that take part in the program undergo an environmental audit and attain goals in at least three areas of environmental improvement.

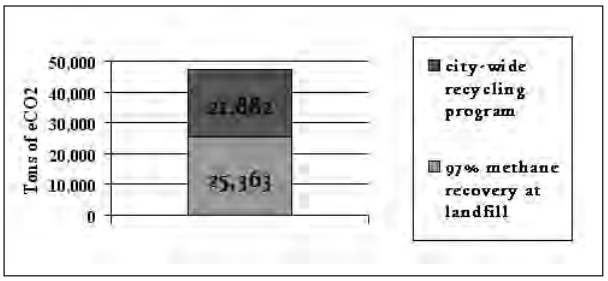
We are also aggressive in promoting and marketing energy-efficiency programs and renewable energy. For example, we recently partnered with Utah Power, our local electrical utility, on a direct mail marketing campaign of their Blue Sky program, which allows customers to purchase pollution-free wind energy.

Salt Lake City saw a major victory recently when we were able to stop a state highway construction project that would have increased air pollution, sprawl development, and auto dependence in our region.

We are not yet tracking data on these projects, but state air quality monitors and the non-profit group, Envision Utah, are ready to assist Salt Lake City in establishing baselines and monitoring progress as we enter Phase 2 of our Local Climate Action Plan.

2002 SALT LAKE CITY GREENHOUSE GAS REDUCTIONS FROM WASTE MEASURES

Salt Lake City methane recovery and recycling program reduced greenhouse gas emissions by 47,245 Tons CO_2



A snapshot of the incredible emissions reductions we will see as we begin tracking measures in the community is presented here.

Efforts to better manage our landfill has brought us to a 97% methane recovery factor. This efficiency means our landfill sequesters more greenhouse gases than it produces.

Our expanded recycling program avoided 21,882 tons of emissions.

Cumulatively, progressive waste management reduces greenhouse gas emissions by 47,245 tons each year.

Numbers like this illustrate the feasibility of Salt Lake City doing more than its share in meeting the goals set forth for the U.S. in the Kyoto Protocol.

CONCLUSION

Despite the abandonment of U.S. national leadership, Salt Lake City is taking real action, seeing real results, and allowing no excuses to prevent us from slowing global climate change.

We are committed to working with all of you to find solutions that will not only ensure that future generations enjoy a healthy, stable climate, but that also cause our own health, regional environments, and local economies to grow and flourish in ways that will enrich our lives, and the lives of our world neighbors.