



CLIMATE PROTECTION PLAN

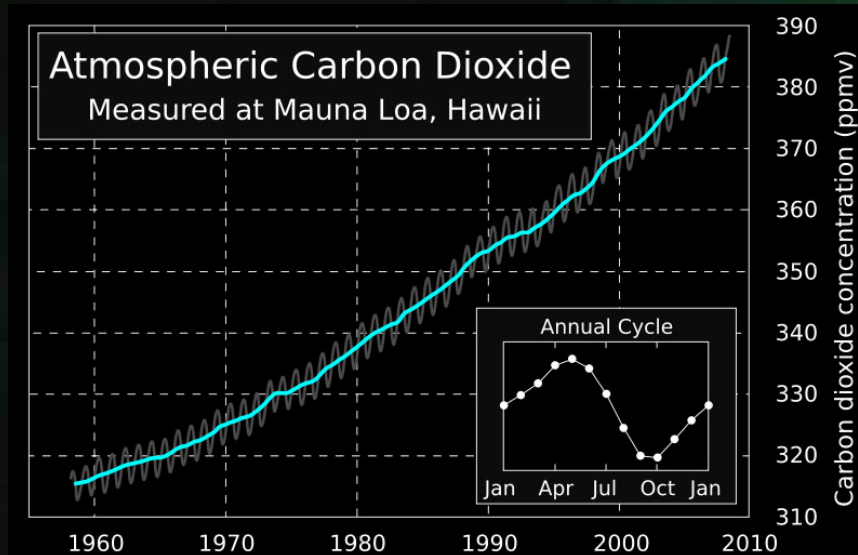
CLIMATE PROTECTION TASK FORCE
REPORT TO LAWRENCE CITY
COMMISSION

3.31.09

CLIMATE CHANGE

The United Nations Intergovernmental Panel on Climate Change (IPCC), a global consortium of scientists, has determined that the warming of our climate system is “unequivocal” and is most likely due to the increase in greenhouse gas concentrations generated by human activity.

IPCC Fourth Assessment Report: Climate Change 2007



“Keeling Curve,” as reproduced in Wikipedia

CLIMATE CHANGE IN LAWRENCE

- Increased temperatures, more heat waves
- Lower heating costs, higher air-conditioning costs
- More intense storm cycles
- Higher probability of flooding
- Higher rates of evaporation and transpiration
- An overall need for more water, with less total moisture available

Adoption of Mayors' Climate Accord



CLIMATE PROTECTION TASK FORCE

Michael Dever, Chair, Mayor, City of Lawrence

Carey Maynard-Moody, Vice-Chair, Sierra Club

Chad Luce, Manager, Customer and Community Relations, Westar

Dr. Bridget Chapin, Campus Coordinator & Associate Professor of Biology, Haskell Indian Nations University

Jeff Novorr, Lawrence Memorial Hospital

David Dunfield, Treanor Architects

Susan Rodgers, Environmental Administrator, Hallmark Cards

John Geist, Energy Manager, USD 497

Simran Sethi, Sustainability Advisory Board member, Journalist, and University of Kansas School of Journalism Visiting Professional Chair

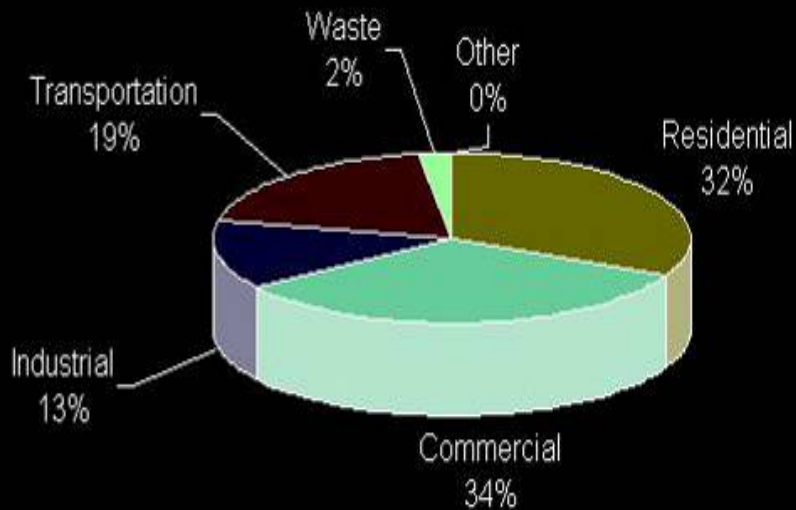
Charles Gruber, Hedges Real Estate

Jeff Severin, Director, University of Kansas Center for Sustainability

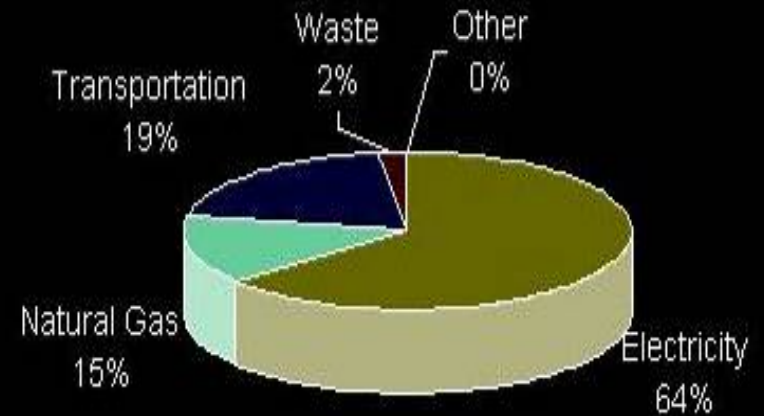
Steve Hughes, President, Hughes Consulting Engineering, PA

BASELINE DATA

2005 Summary Report



2005 Emissions Sources



GHG EMISSIONS REDUCTIONS GOALS

- Timeline for achieving reductions goals:
 - 30% reductions by 2020
 - 50% reductions by 2030
 - 70% reductions by 2040
 - 80% reductions by 2050

WORK GROUPS

- Energy Efficiency, & Conservation: Steve Hughes (Chair), Steve Bennett, David Dunfield, James Dunn, Ron Durflinger, John Geist, Joe King, Larissa Long, Chad Luce, Barry Walthall.
- Policy, Education, & Outreach: Simran Sethi (Chair), Marty Birrell, Cynthia Boecker, Phil Cauthon, Robert Glicksman, Derek Helms, Sarah Hill-Nelson, Nancy Jackson, Gwendolyn Klingenberg, Lisa Patterson, Jeff Severin, Brian Sifton, Daniel Wildcat.
- Transportation: Carey-Maynard Moody (Chair), Karen Clawson, Marc Epard, Todd Girdler, Charles Gruber, Marian Hukle, Lisa Pool, Bart Rudolph, Kyle Schneweis, Steve Stewart.
- Waste Management: Susan Rodgers (Chair), Tammy Bennett, Dwayne Fuhlhage, Kathy Richardson, Chris Scafe, Charlie Sedlock, Bob Yoos.

GHG REDUCTION STRATEGIES

- Work groups developed and prioritized strategies
 - Emphasize impact relative to cost
 - Identify “low hanging fruit”
- Need for coordinated effort citywide
 - Effort provided by current staff for 2009
 - Dedicated staff recommended for 2010

STRATEGY 1:

- DEDICATED STAFFING
 - Establish Full-Time Position, as have:
 - Fayetteville, Arkansas
 - Flagstaff, Arizona
 - Kansas City, Missouri
 - Durham, North Carolina
 - Corvallis, Oregon
 - LaCrosse, Wisconsin
 - and many more

STRATEGY 2:

- ENERGY CONSERVATION

- Energy use in buildings represents 39% of all energy use in the United States.*
- Energy-efficiency is “the largest, cheapest, safest, cleanest, fastest way to provide energy services.”**
- City efforts to date resulted in 5.7% reduction in electrical use from 2006 to 2007.



* Alliance to Save Energy

**Amory Lovins, Rocky Mountain Institute

STRATEGY 3:

- LAND USE PLANNING

- City form influences travel distance and carbon footprint.
- City's adoption of SmartCode is an important step.
- “Complete Streets” aims to accommodate all modes of travel.



STRATEGY 4

- TRANSPORTATION

- Fastest growing source of GHG emissions in US, according to the EPA.
- Public transportation saves energy, reduces GHGs, and saves consumers money.
- Develop programs to encourage alternative fuel vehicles and alternative modes of travel.



STRATEGY 5

- OUTREACH & EDUCATION
 - Businesses and families need to know it **can** be easy being green – and can save money.
 - Build on current successes.
 - Social marketing: leadership, peer-to-peer, incentives, and feedback.



STRATEGY 6

- WASTE REDUCTION

- Lawrence has strong recycling programs.
- Emphasis needs to shift toward reducing waste generated.
- Goal: reduce waste per capita from 4.5 pounds per day to 2.25 pounds per day by 2023.



STRATEGY 7

- MUNICIPAL LEADERSHIP

- Leadership by example is critical.

- City is 4th largest local employer, generates 34% of commercial GHGs.

- Many efforts already in place.

- Invite school district , universities to join the effort.



SUMMARY

- Lowering GHGs can yield cost savings to city, businesses and families.
- Sustainability initiatives can attract environmentally-conscious economic growth.
- City leadership is essential.
- Success will require an ongoing effort.

WHY DO THIS?

The motivation:

Improving the quality of life for citizens of Lawrence, our region, and our world, while living within the capacity of our environment to sustain future generations.

