



SPRAW
HURTS US ALL

GLOBAL WARMING:

Sprawling Across the Nation

“Our duty is to use the land well, and sometimes not to use it at all.”

– President Bush

Global Warming Degrades the Environment and Comes With a Huge Price-Tag

Global warming is caused by the build-up of heat-trapping carbon dioxide pollution in the atmosphere. Scientists predict that global warming will damage our coasts and crops, encourage the spread of infectious diseases and lead to the extinction of many plant and animal species.

The burning of ever-increasing quantities of coal, oil and natural gas in our cars and power plants is the source of the carbon dioxide pollution, however, we can take responsible steps to solve this problem.



The Problem at Home

Sprawling development creates homes further from jobs, shopping and other services. This causes two major problems; increased vehicle miles traveled (VMT) and increased infrastructure needs. The infrastructure needs arising from sprawling development cost a household \$630 more per year and produces 8 more tons of CO2 emissions.ⁱⁱⁱ

These statistics conceal a stark truth: the hidden costs of sprawl require us to pay for the destruction of our environment from our own bank accounts whether we want to or not.

Could Sprawling Development be Increasing Global Warming? YES!

As development stretches further from urban centers, services and infrastructure are extended, and more land is paved for parking lots and roads.

Almost 70% of the recent increases in driving were due to the impacts of sprawl. Already over one third of the total

Stuck in Our Cars

Sprawl and a lack of transportation options forces people to own and drive cars in order to reach most destinations. Sprawling cites have driving related energy consumption rates that can be three times that of better planned, more compact cities that offer transportation choices. Between 1980 and 1997, VMT in cars, trucks, and buses increased an astounding 68%.^{iv}

The average U.S. household spends about 18% of its budget on transportation, making it the second largest household expense.^v



Cooling the Planet through Smart Growth

Smart Growth Plays a Key Role in Curbing Global Warming

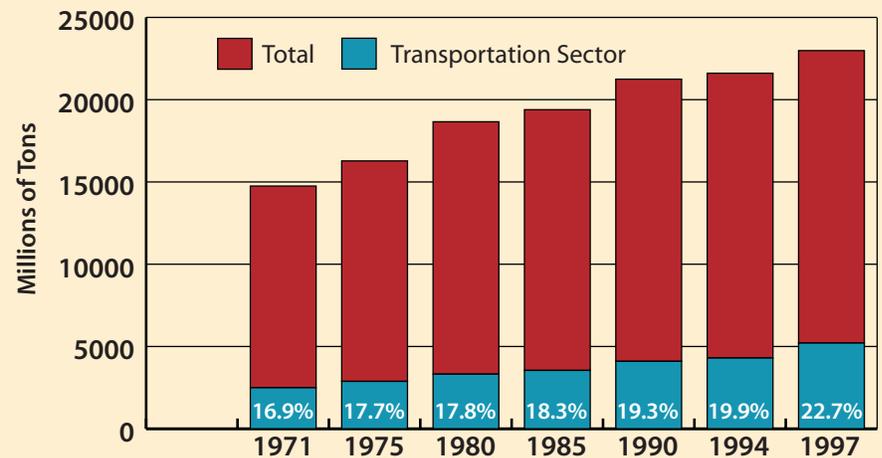
Smart growth is intelligent, well-planned development that channels growth into existing areas, provides transportation choices and preserves farm land and open space. Through better planning, smart growth reduces dependence upon cars and alleviates congestion, thus reducing the sprawl created burdens to our budgets and our environment.

Smart growth makes it possible to design homes and neighborhoods so that they are closer to jobs, shopping, and transit. In combination with improved transit systems, more pedestrian and bicycle friendly design, it is possible to greatly reduce residents' contributions to global warming.

Benefits of Smart Growth

- Placing new development within already built areas reduces VMT by as much as 61% and CO2 emissions by 50%.^{vi}
- Planning pedestrian-friendly development along with good transit systems would save the average household over \$2000 a year on transportation and save 40 million tons of carbon emissions.^v
- If 25 million units of new housing built in the U.S. over the next twenty-five years are placed in a more space-efficient way, 3 million acres of land would be preserved, 3,000 fewer new miles of state roads would be needed, and at least \$250 billion would be saved.ⁱⁱ
- In another 50 years, implementing smart growth measures would save 200 million metric tons of carbon emissions per year.^v
- Design improvements to homes can result in at least 30% greater energy efficiency in heating, cooling, and water heating.^{vii}

World CO2 Emissions, Total and Transportation Sector, 1971-97ⁱⁱ



Choices for Easing Congestion

Often, building more roads is the proposed solution to traffic congestion, but as people around our nation are learning, more roads often mean more traffic, not less. Let your neighbors and local governments know about the link between global warming and sprawl. If you are interested in taking further action, the Sierra Club offers many tools to help you promote smart growth and curb global warming.

FOR MORE INFORMATION about the Sierra Club's support for safe, clean public transportation or about the Challenge to Sprawl Campaign, contact **Melody Flowers**, Associate Washington Representative, (202) 675-7915, melody.flowers@sierraclub.org; or **Brett Hulsey**, Senior Midwest Representative, (608) 257-4994, brett.hulsey@sierraclub.org.

SOLUTIONS

Smart Growth provides a range of solutions to the problem of global warming. These include:

- **LAND USE PLANNING** – through land use policies such as mixed use ordinances, traditional neighborhood development standards, growth boundaries, and infill development, transportation options can be increased, reducing both car dependency and infrastructure needs;
- **PUBLIC TRANSPORTATION** – through increased spending on transit, the creation of regional transit authorities, transit oriented development, and transportation control measures, it is possible to increase use of public transportation options and decrease global warming pollution;
- **COMMUNITY REVITALIZATION** – through affordable housing development code provisions, community land trusts, and neighborhood conservation policies, homes can be located closer to jobs and in already developed neighborhoods;
- **FOR MORE SOLUTIONS**, see Sierra Club's Solutions Manual