



Taking Charge: Personal Initiatives

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The Intergovernmental Panel on Climate Change (IPCC) stated in 1995 that “the balance of evidence ... suggests that there is a discernible human influence on global climate.” With this statement, scientists moved human-induced climate change from the realm of theoretical speculation to accepted fact. Climate change is real and it is happening now.

In 1995, Canada produced 619 million tonnes of the greenhouse gas emissions that have begun to change our climate. Eighty-three percent of these emissions were produced by the combustion of fossil fuels (coal, oil, natural gas) to provide energy to power our industry, heat and light our homes and businesses, and fuel our vehicles. To pre-empt the negative impacts climate change will have on Canada's ecosystems and economy, we must immediately:

- use fossil fuels more efficiently;
- switch from fossil fuels that produce the most carbon dioxide (coal) to fossil fuels that produce the least carbon dioxide (natural gas); and
- replace fossil fuels with renewable energy sources like the sun, wind, biomass and falling water.

Canada's greenhouse gas emissions are, however, moving in the wrong direction. Despite our government's commitment to stabilize emissions of greenhouse gases at 1990 levels by the year 2000, Canada's emissions had already increased to 9.8% above 1990 levels by 1995 and are projected to increase to 19% above 1990 levels by the year 2010.

Each of us must contribute to the climate change solution. The average Canadian produces five tonnes of greenhouse gas emissions each year to meet his or her personal transportation needs, as well as for space and water heating and use of appliances in the home. Fortunately, there are many changes

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we can make in our behaviour and lifestyle and our purchasing decisions that will cut our energy use, reduce our energy bills and protect the climate. Some of the most important things you can do are listed below. There are many more possible actions and these are described in the full report.

Transportation

- Get out of your car – use public transit, car pool, walk or cycle.
- Purchase a more fuel-efficient vehicle next time.

Space heating and cooling

- Reduce air leakage from your home and install an energy-efficient furnace.
- Purchase a home that meets or beats the federal government's R-2000 building standards.
- Strategically plant trees around your home to reduce your demand for space heating and cooling, and maximize your use of passive solar energy.

Household electricity use

- Purchase energy-efficient equipment, appliances and light bulbs.
- Demand “green” power from your utility.

Water heating and use

- Purchase water-efficient equipment (e.g., shower heads, toilets).
- Lower the thermostat on your hot water tank and use a solar hot water heater to reduce demand on your current system.

The extent to which you take action depends on your own commitment to climate protection. However, the structure and organization of our communities can be a barrier to your efforts. Most Canadian cities are characterized by urban sprawl, strict separation of residential and business areas, and many large single family residences. These design characteristics make it harder to reduce greenhouse gas emissions in our communities because they make alternatives to the car less practical, and they make physical infrastructure for heat, power and water more costly and inefficient.

When we run into barriers to climate protection, we can respond by simply throwing our hands up in frustration and walking away. Or, we can use our power as citizens and consumers to make change happen. For many of us, the first step we can take is to work to influence the level of government closest to our day-to-day lives: municipal government.

With their responsibilities for land use planning, building standards, waste management, and water and transportation infrastructure, municipal governments are uniquely positioned to reduce greenhouse gas emissions produced in their communities. As a concerned citizen, you can pressure your municipal

government to develop a comprehensive response to the climate change issue.

Such a response should include:

- making a clear political commitment to climate protection;
- developing a greenhouse gas emissions inventory;
- identifying performance targets for greenhouse gas emissions reduction;
- designing and implementing an action plan to reduce emissions; and
- measuring, monitoring and assessing progress.

Some of the broader climate protection objectives you can encourage your municipal government to pursue are listed below. Undertaking action in support of these objectives can reduce energy use and community energy bills, and create jobs and local economic activity when these savings are re-spent in the community. Specific actions are described in the full report.

Land use planning and site design

- Allow mixed land use.
- Encourage higher density development in residential areas.
- Make alternate modes of transportation a high priority.
- Improve traffic management techniques.
- Maximize the potential use of renewable energy sources like the sun.

Energy efficiency in buildings

- Provide administrative and financial incentives for builders to exceed provincial building code standards for energy efficiency when constructing new buildings or retrofitting existing buildings.
- Challenge community leaders to voluntarily improve energy efficiency in their facilities and upgrade the energy efficiency of municipal buildings.
- Showcase energy efficient technology in demonstration buildings.

Renewable energy

- Purchase “green” power.
- Utilize renewable energy in niche and remote applications.
- Capture and use landfill gas as an energy source.

Transportation

- Provide a range of alternative transportation modes and regulatory and fiscal incentives to encourage citizens to use them.
- Use bylaws to ensure vehicles operate efficiently.

Urban afforestation

- Protect and maintain existing trees.
- Plant new trees.

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As concerned citizens, we can persuade our municipal governments to take actions that will protect the climate. We can also use our power as consumers to influence corporate policy on greenhouse gas emissions. For example, we can:

- raise the climate change issue with corporate leaders;
- consider climate change performance when deciding what companies we will purchase goods and services from or invest in; and
- create a demand for new climate-friendly products in the marketplace.

Finally, we can hold our federal and provincial governments accountable for the commitments Canada has made internationally to address climate change. We can pressure political leaders to provide an economic and regulatory framework that sets standards and provides incentives for greenhouse gas emissions reduction. Some key components include:

- implementing ecological tax reform that increases taxes on greenhouse gas emissions and decreases other taxes;
- ending subsidies for the production and consumption of fossil fuels and ensuring that investments in energy efficiency and renewable energy receive equivalent or better tax treatment than investments in fossil fuel production;
- establishing mandatory minimum energy efficiency standards for major energy-using products – cars, houses and other buildings;
- creating a legal cap on greenhouse gas emissions for some polluters and requiring major new fossil-fuel energy developments to offset some of the emissions they will produce; and
- increasing funds for programs targeted at energy efficiency improvements, transportation demand management, green power procurement, and research and development into energy efficiency and renewable energy technologies.

The planet – on which all of us ultimately depend – needs our help. Each of us can make a difference through individual actions and the use of our power as consumers and citizens. Many of the actions we need to take will save us money and create jobs. There is no time to waste; the economic and environmental consequences of climate change demand action now.