



The Link Between Garbage And Climate Change

The disposal of garbage produces Green House Gases (GHGs) in a number of ways. First, the anaerobic decomposition of waste in landfills produces methane, a GHG 21 times more potent than carbon dioxide. Second, the incineration of waste produces carbon dioxide as a by-product. In addition, the transportation of waste to disposal sites produces GHGs from the combustion of the fuel used in the equipment. Finally, the disposal of materials indicates that new products are being produced as replacements; this production usually requires the use of fossil fuels to obtain raw materials and manufacture the items.

How can certain waste management strategies reduce GHG emissions?

Waste prevention and recycling—jointly referred to as waste reduction—help us better manage the solid waste we generate. However, preventing waste and recycling also are potent strategies for reducing GHG emissions. Together, waste prevention and recycling:

- **Reduce methane emissions from landfills.** Waste prevention and recycling (including composting) divert organic wastes from landfills, thereby reducing the methane released when these materials decompose.
- **Reduce emissions from incinerators.** Recycling and waste prevention allow some materials to be diverted from incinerators and thus reduce GHG emissions from the combustion of waste.
- **Reduce emissions from energy consumption.** Recycling saves energy. Manufacturing goods from recycled materials typically requires less energy than producing goods from virgin materials. Waste prevention is even more effective at saving energy. When people reuse things or when products are made with less material, less energy is needed to extract, transport, and process raw materials and to manufacture products. The payoff? When energy demand decreases, fewer fossil fuels are burned and less carbon dioxide is emitted to the atmosphere.
- **Increase storage of carbon in trees.** Trees absorb carbon dioxide from the atmosphere and store it in wood, in a process called "carbon sequestration." Waste prevention and recycling of paper products allow more trees to remain standing in the forest, where they can continue to remove carbon dioxide from the atmosphere.

Want More Info?

- Visit **Urban Impact** on the web at www.urbanimpact.com or call **604.273.0089**.
- Or visit the **Recycling Council of BC** www.rcbc.bc.ca (732-9352) REC-YCLE.