

PHOTO: ENVIRONMENT CANADA

## SOLID WASTE MANAGEMENT

Currently 80 percent of municipal and industrial solid waste in Canada is disposed of by landfilling processes, with the remainder disposed through recycling, resource recovery and incineration. As a result of the introduction of more stringent regulations in many countries, solid waste management has become one of Canada's fastest-growing environmental sectors. While the emphasis to date has been on the North American market, Canadian equipment, technologies and services are now being sold worldwide.

Canadian expertise in solid waste management includes composting and recycling technologies, material recovery facilities, co-generation incineration, waste management planning, sludge management, anaerobic treatment, soil remediation, landfill and liner design, and hazardous waste disposal.

## HAZARDOUS WASTE DISPOSAL AND SITE REMEDIATION

A number of Canadian waste management firms offer specialized services and technologies for oil and gas extraction and delivery, electrical power generation, and pulp and paper manufacturing, to name a few. Several firms in British Columbia, Alberta, Ontario and Nova Scotia have developed considerable expertise in cleaning up oil-contaminated sites and marine oil spills. Other unique Canadian technologies treat specific chlorinated contaminants, heavy metals or oily sludges.

New Canadian hazardous waste technologies also help prevent pollution and reduce and recycle hazardous waste. As well, many Canadian environmental service firms offer site assessments and diagnostics using advanced instrumentation in preparation for site remediation. A few companies market specialized thermal, biological, phyto and chemical technologies for contaminated soil treatment.

## ALTERNATIVE ENERGY TECHNOLOGIES AND ENERGY EFFICIENCY

The Kyoto Climate Change Convention is pointing the way to the future for energy companies relying on fossil fuels — greenhouse gas (GHG) emissions must be reduced. Energy efficiency and renewable energy technologies will be the primary means of doing so.

A number of Canadian environmental companies currently offer technological solutions that control emissions, improve energy efficiency and reduce GHG emissions. Fuel cell technology, small-scale hydro, and biomass fuel conversion, for instance, all provide efficient, low-emission sources of power, and are recognized as some of the best technological solutions to mitigate climate change. Canada is a world leader in the early commercialization of these technologies and is strategically positioned to capture a substantial share of the global market for micropower — small, clean, reliable and cheap generating technologies for use in transportation, electricity generation and portable heating products. In fact, Canadian firms are among the few in the world that have clustered to build and successfully demonstrate technically viable hydrogen fuel cell engines for buses.

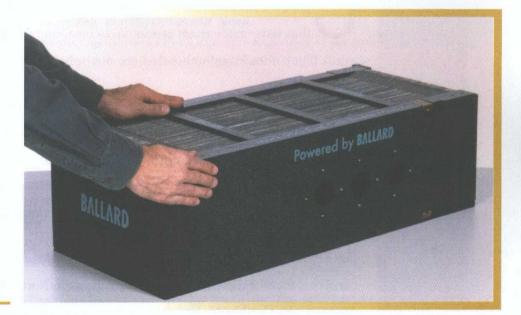


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