

The "Ecological Footprint"

The concept of the "ecological footprint" was developed by faculty and graduate students at the School of Community and Regional Planning and the Task Force on Healthy and Sustainable Communities at the University of British Columbia. It helps people to understand the link between their lifestyles and nature and allows them to visualize the impacts of their consumption patterns on nature, much like a footprint in the earth.

The ecological footprint is the land that is required to support a particular or defined lifestyle indefinitely. It is an accounting tool that uses land area as its measurement unit to find out whether nature can provide enough resources and assimilate waste in order to secure good living conditions for everyone in a community. Various categories of human consumption and waste generation are translated into areas of productive land required to support those items. From that, the area of land required by a given group of people (household, city, or country) to provide its resources and assimilate its waste products can be calculated. This land area is known as the "appropriated carrying capacity" or, more simply and graphically, the group's ecological footprint.

The ecological footprints of individual regions are much larger than the land areas they physically occupy. For example, it was found that the residents of the Lower Fraser Valley in British Columbia "appropriate" the productivity of an area nineteen times the size of their home region to satisfy present consumption levels of food, forest products, and fossil fuels.

Ecological footprint analysis can be applied to projects, policies, programs, and technologies. As a planning tool it enables communities to envisage the limits to their consumption by pointing out likely shortfalls and use this knowledge toward reducing their footprint. As an educational tool it engenders awareness of the ecological impacts of consumption.

Trends in Community Action

Canadians are organizing groups to advance the sustainability of their communities. Community-based groups drawing from all sectors of society can be found in every province and territory. These groups are identifying issues and finding solutions based on consensus using a variety of tools.

Sharing Best Practices

Canadian communities are learning from each other by sharing information on best practices. Best practices are examples of actions that could be recommended for further application, whether in a similar or adapted form. They are actions, initiatives, or projects that have resulted in clear improvements in the quality of life and the living environments of people in a sustainable way.

For example, in British Columbia, Vancouver is creating new downtown waterfront neighbourhoods in an area formerly dedicated to industrial, rail, and port activities.

Under the Arctic Environmental Strategy (AES), the Community Resource Management Program supports projects driven by community priorities and interests. For example, the program contributed to a project of the Stewart Valley Salmon for the Future Society. Before adding to salmon stocks in the Stewart-Mayo River system, the society surveyed salmon, salmon fry, other fish species, and predatory bird populations to determine how many extra chinook salmon the river system could handle. Members of Nacho Nyak Dun First Nation and local junior high-school students conducted the surveys. More information on the AES is in the section of this report on protection of the oceans and other seas.