



Memphrémagog
Conservation inc.

Conservation
benefits us all

The conservation of natural landscapes allows for the preservation of forests, water courses, lakes, wetlands, the flora and fauna living within them, and the ecological functions which are at the very source of the ecological goods and services which benefit us all.

Ecosystems support essential processes and provide a number of services for our wellbeing and for the economy. However, without biodiversity and ecosystems, no ecological goods or services would exist.

These goods and services are generally divided into four distinct categories:

- Support services, necessary to the production of all other goods and services, include the creation and retention of soil, the production of oxygen, the recycling of nutrients and water and the production of biomass;
- Regulation services are benefits generated by the regulation of ecosystem processes. They include, among others, pollination, carbon sequestering, climate regulation and water filtration;
- Procurement services provide ecosystem goods such as retention and storage of fresh water, food and raw materials;
- Sociocultural services provide non-material benefits, for example the aesthetic appreciation of a natural landscape, our cultural heritage and recreational and tourist activities.

Examples of ecological goods and services provided by ecosystems

Forests

- Forests use carbon dioxide from the air and produce oxygen and sequester carbon, thus reducing greenhouse gas concentrations in the atmosphere.
- They stabilize the soil, control runoff, reducing erosion and sedimentation.
- They provide a milieu for the development of leisure activities such as hunting, hiking, and cross-country skiing, and encourage the development of ecotourism.
- They provide the raw materials for the forestry industry, as well as for the maple syrup industry, providing important economic benefits for the region.

Wetlands

- Wetlands are natural filters, improving the quality of water. They contribute to the neutralizing of contaminants such as phosphorus and nitrogen that flow into our rivers and lakes, as well as in the water table.
- They contribute to the recharging of aquifers.
- They aid in flood control, as they can store large volumes of water.

Lakes, watercourses and riparian zones

- Lakes and rivers are an important source of fresh water, and contribute to the recharging of aquifers.
- They are an essential component of the water cycle, and contribute to the control of flooding by storing large volumes of water.
- Lakes moderate the local climate by absorbing heat in hot weather and releasing it in cooler weather.
- Riparian zones of lakes and rivers filter and reduce runoff from nearby land, thus capturing sediments and their associated pollutants, such as nutrients and pesticides.
- They also absorb floodwaters and slow water flow during flood prone periods, thus reducing the risks of flooding and erosion.

All of these natural landscapes provide habitat for a large number of species, including those considered vulnerable or at risk.

When ecosystems, and thus their functions, are destroyed, these ecological goods and services are lost, and at the same time, their

economic value, as well as our quality of life are negatively impacted. The conservation of natural landscapes, with the help of private property owners, allows for the maintenance of these ecosystem functions and the multitude of goods and services that flow from them.

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