



SYSTEM DIMENSIONS	CHEMICAL AND PHYSICAL	BIOLOGICAL COMPONENTS	HUMAN USES
Extent Pattern	Nutrients, Carbon, Oxygen Contaminants Physical	Plants and Animals Communities Ecological Productivity	Food, Fiber, and Water Recreation and Other Services

## Extent of Freshwater Ecosystems

**What Is This Indicator, and Why Is It Important?** This indicator reports the area of wetlands and lakes, reservoirs, and ponds and the length of small, medium, and large streams and rivers. For streams and rivers, the indicator also reports on the type of land cover on their shorelines and adjacent areas (“riparian” areas): forest; grasslands, shrublands, or wetlands; and urban/suburban or agricultural land.

America’s fresh waters provide critical fish and wildlife habitat and are an important component of most other ecosystems. They also provide people with many goods and services, including drinking water; water for industrial use, livestock, and irrigation; and opportunities for recreation. In addition, wetlands and riparian areas help filter runoff and reduce flooding, and rivers and lakes receive a variety of discharged wastes.

**Why Can’t This Entire Indicator Be Reported at This Time?** Several methods are used to classify streams—by discharge, by drainage area, or by the number of tributaries a stream has. Since no single method has been agreed upon for general use, there are no national data sets for reporting on stream size.

**What Do the Data Show?** About half of all Colonial-era wetland acreage in the lower 48 states has been converted to agriculture, development, or other land uses. By the 1990s, about 10% of the wetlands that existed in the 1950s had been lost, although the rate of loss slowed after 1985.

Lakes, ponds, and reservoirs occupy about 21 million acres, or one-fifth as much area as is occupied by wetlands. The area of ponds (usually less than 20 acres) has increased by over 100% since the mid-1950s. This is believed to reflect the construction of small ponds, but the data do not distinguish natural from constructed ponds.

For more than three-fourths of their length, the riparian areas of streams and rivers are forested or covered with other natural vegetation.

The technical note for this indicator is on page 246.

