The Terrebonne Basin extends from Pointe Coupee Parish to Terrebonne Bay, including a diverse landscape of agricultural lands, rural and urban communities, bayous, lakes, wetlands, estuaries and marshes. The history of the Terrebonne Basin is as diverse as its landscape with early settlements by the Houma Indians, African Americans, the Spanish and the French, each of which were dependent on the bayous and rivers for food, water, transportation and commerce. The words "terre bonne" mean "rich earth", named by the French, who were impressed by the productive soils and marshes that comprise the lower portion of Terrebonne Parish. The predominant land-use throughout the basin is agriculture, with sugarcane and pastures on the ridges and forested wetlands in the lower elevations, giving way to freshwater and saltwater marshes in the coastal areas as the land converts to open water in Terrebonne and Timbalier Bays.



Success through Partnerships

Restoring water quality and habitat relies upon the partnerships of many levels of government, non-profit organizations and the people that live, farm and fish within those watersheds. Some of these partnerships already exist and are working to provide cost-share and technical assistance for implementation of BMPs on agricultural lands, forested areas and within rural and urban communities. These partners include:

- Louisiana Department of Environmental Quality
- Barataria-Terrebonne National Estuary Program
- BTNEP Management Conference Committee
- USDA Natural Resource Conservation Service
- Local Soil and Water Conservation Districts
- Nicholls State University
- Louisiana Department of Agriculture and Forestry
- The Louisiana Nature Conservancy
- U.S. Fish and Wildlife Service

If you want to become more involved in your local watershed programs, please contact the Barataria-Terrebonne National Estuary Program or the Louisiana Department of Environmental Quality (LDEQ).





Terrebonne River Basin

Wafer Qualify Concerns

Most of the water bodies in the Terrebonne Basin are meeting water quality standards for contact recreation such as swimming and boating, but are not fully in compliance with the fish and wildlife propagation uses. The reasons for the impairments include dissolved oxygen, sedimentation, nutrient over-enrichment, non-native aquatic plants, turbidity and suspended solids. The sources of these pollutants include agricultural crop production, on-site sewage treatment systems, municipal point sources and urban storm water runoff. Within the agriculture areas in the northern portion of Terrebonne Basin, the bayous receive too much sediment and nutrients whereas the wetlands and coastal marshes in the southern portion of the basin are sediment and nutrient starved, resulting in coastal land loss, coastal erosion and subsidence. Calculations and models have indicated that as much as 70-100% of the man-made nonpoint source pollutants need to be reduced in order for the bayous to meet the existing water quality standards for dissolved oxygen.

Restoring the Water Quality

There are already many on-going efforts within the Terrebonne Basin to improve water quality and restore coastal wetlands and marshes. The Barataria-Terrebonne National Estuary Program (BTNEP) and their Management Conference committee provide a forum for a diverse group of agencies, parish officials, non-profit organizations and other entities to continue to make progress on improving the quality of life in the Terrebonne Basin. People within the basin have been involved in these programs and have the opportunity to continue that involvement by working with their local agencies and governments on implementation of best management practices (BMPs) on agricultural lands, in forested wetlands and in urban and rural communities. The types of BMPs that can be utilized include:

• AGRICULTURE – conservation tillage, erosion control, mulch residue on sugarcane fields following harvest and during the fallow seasons, rotation grazing on pastures, fencing to keep cattle out of bayous, pesticide and fertilizer management practices;

• **FORESTRY** – selective harvest, harvest in dry seasons to prevent rutting of the soils, natural and artificial regeneration of native forests, leaving streamside management zones;

• URBAN STORM WATER – construction BMPs, storm drain marking and education on fertilizer and pesticide management, storm water redirection into wetlands at pumping stations, green infrastructure, rain gardens, porous parking lots;

• HOME SEWAGE SYSTEMS – maintenance of existing home sewage systems, repair or replacement of old, failing systems, installation of rock-plant filter systems;

• **HYDROMODIFICATION** – retain natural channel of the bayou and rivers, manage stream bank vegetation to protect the bayou and habitat for rare plants and animals.

In addition to protecting and restoring water quality in the Terrebonne Basin, there are also many special habitats that provide homes to native plants and animals that are rare, threatened and endangered. Some of the management practices that help improve water quality also protect and restore these special habitats. Included in these habitats are cypress-tupelo forests, coastal live oak hackberry forest, coastal mangrove/marsh shrub land, fresh water and brackish marshes, barrier islands, coastal dune grassland. Some of the species that rely upon these habitats are bald eagle, Louisiana black bear, sand rose-gentian, brown pelican, roseated spoonbill, peregrine falcon, Cooper's hawk, reddish egret, piping plover, osprey and pallid sturgeon. Some of the stressors to these habitats and species include residential, commercial and industrial development, agricultural production, hydrological modifications such as channelization, herbicide spraying of ditches and roadsides, construction of pipelines, roads and utilities and coastal land loss, saltwater intrusion and subsidence (The Natural Heritage Program).

Terrebonne River Basin

Protecting and Restoring Native Habitats