

## Double Bayou History

Human history in this area likely includes the presence of pirates including Jean Lafitte during the 1820s. In the 1830s, the Anahuac area saw groups of Mexican and Anglo settlers. The weather and flat pasture land were enticing to people for ranching cattle.

In 1831, the Mexican government began building Fort Anahuac as the tension between Mexico and Texas escalated. This location was advantageous because it was on a hill overlooking the Trinity River near Galveston Bay.

Anahuac is the name of the ancient home of the Aztecs. The fort was lost to history until recently when the Texas Historical Commission and a private archaeological company were able to unearth the original foundation. Chambers County desires to preserve the remains and create a museum to honor the Texians who fought in rural Chambers County.

After the Texas Revolution, rice plantations were prevalent, and irrigation canals were created. By 1906, there was water flowing through canals delivering irrigation water to 10,000 acres, mostly within the Double Bayou Watershed. A few years later in 1909, a rice warehouse and rice dryer was built in the area.

In 1875, Ross Sterling was born in Anahuac. Sterling helped form Humble Oil (know later as ExxonMobil) in 1911, and was elected the 31<sup>st</sup> Texas governor in 1931. Anahuac earned a spot in the oil industry first in 1925, and again in 1935. Oil was found at two ranches, one of

which would become the Anahuac field at Monroe City. The oil money was used to build a new school and county courthouse.

Conservation of the area started in the 1940s with the formation of the Trinity Bay Conservation District. Conservation efforts in this area are still strong today as further articles in this newsletter will show.

The Double Bayou community was settled by African Americans, most of whom were slaves on ranches and farms. Many went on to farm and ranch in their own right. Blues musician, Floyd Davis "Pete" Mayes was born in Double Bayou in 1938. He played often at the local Double Bayou dance hall, across American, and some international locations. The Double Bayou dance hall recently had a historical marker placed outside the building remains.

Oil pipelines were constructed in the bayou region around the 1940s-1950s to speed up the time it took to transport oil to Exxon facilities.

A shipyard was also constructed but has since closed. The oyster business boomed in the 1980s, but was almost destroyed by Hurricane Ike in 2008.

### For more information:

- https://tinyurl.com/52tstm3
- https://tinyurl.com/3xcrca5k pages 21-23

### Watershed Protection Plan

A Watershed Protection Plan (WPP) is a tool to address water quality concerns that affect multiple jurisdictions. These begin at the local level, and involve public meetings to understand the concerns of all stakeholders.

There are six steps established by the Environmental Protection Agency (EPA) to create a WPP. The first step is to build partnerships and determine the key stakeholders and the major concerns. A list of potential goals are established at this stage also.

The next step is to characterize the watershed. This means any existing data is compiled and gaps in the data are identified. The pollutant sources are discussed and an estimate of pollution levels is made.

The third step is to finalize goals and identify solutions. The current levels of pollutants and desired reductions are set. If there are any areas that have higher pollutant loads than the rest of the watershed, these are indicated as critical areas.

An Implementation Plan (I-Plan) is a technical doc-

ument that lays out a schedule and measurable short term goals for achieving the long term goals set in the WPP draft. An I-Plan can be thought of as a road map for improving water quality. Sources of financial assistance are also identified in this document.

Once the I-Plan has been approved by the working committee and stakeholders, the Watershed Protection Plan can start to be implemented. Data collection, monitoring, and educational outreach are typical actions that occur during this stage. As more information is gathered, necessary adjustments are made. At the completion of the WPP tasks, results are shared and stakeholders are informed.

A Watershed Protection Plan (WPP) has been finalized for the Double Bayou region. See link below.

### For more information:

https://tinyurl.com/3xcrca5k

# **Organization Spotlight**Galveston Bay Estuary Program (GBEP)

GBEP is a program through Texas Commission on Environmental Quality (TCEQ). This program was created to develop environmentally sound management plans of the bay area for multiple uses. Some of the current projects include litter prevention and removal.

A recent project was completed and published online that addresses the state of the Bay. It includes historical information and recent analysis of the conditions around and in Galveston Bay.

The regional monitoring project runs from September 2020 to August 2025. The purpose is to collect data relating to environmental parameters in the lower Galveston Bay watershed, which includes Double Bayou. This project is in partnership with

the federal, state, and local governments in the area along with universities and other research organizations. This project will result in a web-based interactive application with data downloads.

There are currently many interactive apps produced by GBEP including an "atlas" of the Galveston Coast area. Layers of the map can be turned on to see bacteria samples, bird sightings, nutrient levels, land cover, and more.

#### For more information:

- https://gbep.texas.gov/
- http://bit.ly/CoastalAtlas

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## What are Best Management Practices?

Best Management Practices (BMPs) are guidelines to reduce erosion and sedimentation. Sedimentation is a term for soil getting into water. Although some soil naturally gets into water, using BMPs can reduce sedimentation during forestry operations.

In Texas, BMPs are voluntary; however, they are still very important in being a good steward of the land.

Forestry operations include timber harvesting (thinning or total harvest), woods road construction, site preparation (shearing, planting, or bedding), as well as prescribed burns.

Road construction and use are often the biggest threats to increased erosion and sedimentation. Anytime dirt work occurs, it will result in some degree of loose soil. However, it can be mitigated by using BMPs.

For woods roads, installing water diversion structures such as waterbars is often the simplest and most effective BMP. Waterbars help to slow down and spread out runoff water, reducing erosion.

Waterbars (picture below) should extend the entire width of the road so water cannot cut around it. The waterbar should also be angled 30-45 degrees across the road, pointing downhill. This prevents it from functioning as a dam and collecting water. The angle diverts the water, forcing it to go off the road. Since the water is now being diverted, it needs a new place to go. This is why wing ditches, or "turnouts," should be connected to waterbars.



The diverted water is carried off the road and through the wing ditch into a vegetated patch of land which will absorb the runoff.

Another very important forestry BMP is to create and maintain streamside management zones (SMZs). These should exist around both sides of a stream. It is recommend the SMZ be 50 feet wide on each side of the stream, leaving at least 50% of tree canopy coverage within this zone of buffering.

By leaving different ages of trees in the SMZ you create "vertical structure." This means younger (shorter) trees and mature (taller) trees provide more choices for wildlife to feed, nest, perch, and hide. A variety of types of vegetation is also good.

SMZs protect the stream bank and serve as filter to catch sediment before it gets into the stream. They also shade the water, preventing extreme temperatures in the summer which could be detrimental to aquatic life. Warmer water is not able to hold as much dissolved oxygen, which inhibits aquatic life.

The darker strip through the photo is a streamside management zone contrasting with the recently harvested surroundings.



All of the Texas Forestry Best Management Practices are located in a handbook, which is available online and as an app.

### For more information:

- https://tfsweb.tamu.edu/Water
- https://tfsweb.tamu.edu/Water\_Publications

Distribution of *The Texas Water Source* is provided free of charge to forest landowners of Chambers and Liberty counties. This publication is funded by the Texas State Soil and Water Conservation Board through a Clean Water Act §319(h) grant from the U.S. Environmental Protection Agency. PLEASE ADVISE US IF YOU WISH YOUR NAME TO BE REMOVED FROM OUR MAILING LIST.

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## There's an App for That

Galveston Bay Foundation needs your #EyesOnGalvBay in order to keep your Bay and community clean! That's why they created an interactive tool for reporting pollution in Brazoria, Chambers, Galveston, and Harris counties.

Galveston Bay Action Network (GBAN) enables citizens to easily report pollution relating to sewage, abandoned vessels, discolored water, fish kills, septic systems, trash and debris, and more. Once a report has been submitted, it's automatically sent to the appropriate authorities to take action.

Take action and ensure the fastest pollution cleanup. Download the Galveston Bay Action Network mobile app for free from the iTunes Store, Google Play, or report online ( https://m3.mappler.net/gban/).

Galveston Bay Foundation is a conservation nonprofit that has served as guardian of Galveston Bay since 1987. Their mission is to preserve and enhance Galveston Bay as a healthy and productive resource. Through actions, partnerships, and a commitment to sound science and research, Galveston Bay Foundation has five main program areas in which they work on behalf of the Bay: education, advocacy, restoration, conservation, and protection. Each program area is broad and deep, offering a range of solutions and opportunities to preserve the Bay for generations.



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