



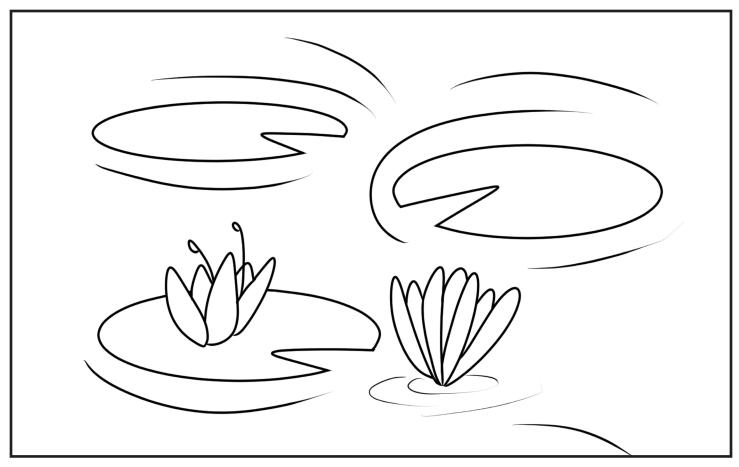
#### What Is A River Basin?

A river basin is an area of land where all of the surface water drains into a large river and its tributaries. Water drains from the highest point of elevation to the lowest point of elevation, from upstream to downstream. Eventually, all of the water in a river basin makes it way to the ocean.

A river basin includes all of the people, plants, and animals that live in it. Because everything in a river basin is connected, anything that we do to the land or water upstream will affect the quality of water downstream.

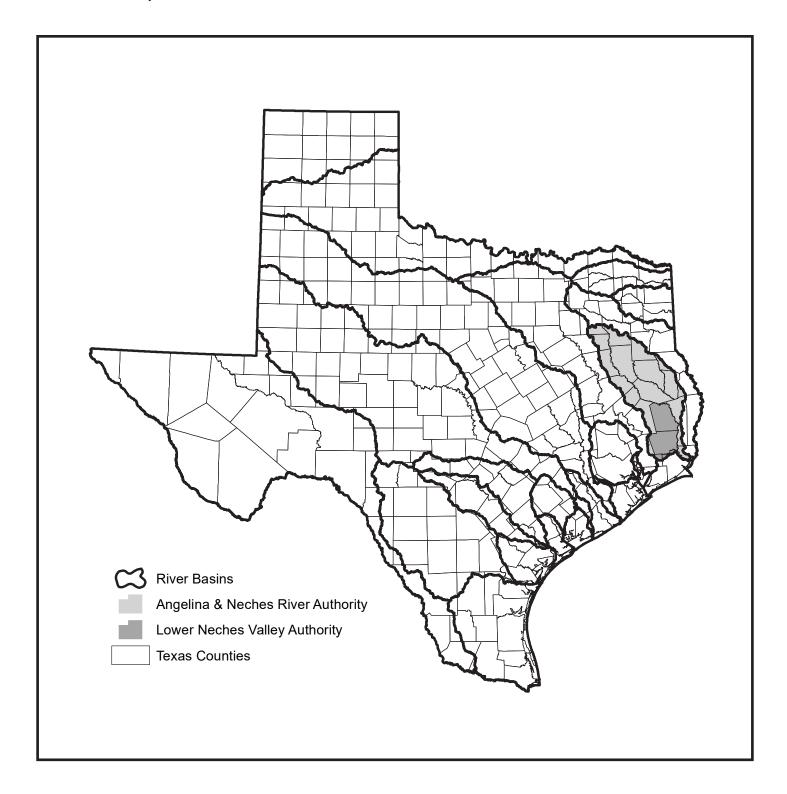
# Why Is A River Basin Important?

Rivers provide water and food for both humans and animals. They also provide a habitat for aquatic plants and animals. We use rivers for recreational activites like swimming, boating, and fishing. We can also use the energy of rivers to produce electricity. Rivers and streams are very important resources for all living things, so it is important that we take care of them.



### What River Basin Do We Live In?

We live in the Neches River Basin. The Angelina & Neches River Authority is responsible for taking care of all of the surface water in the upper part of the Neches River Basin, which includes all or part of 17 counties.

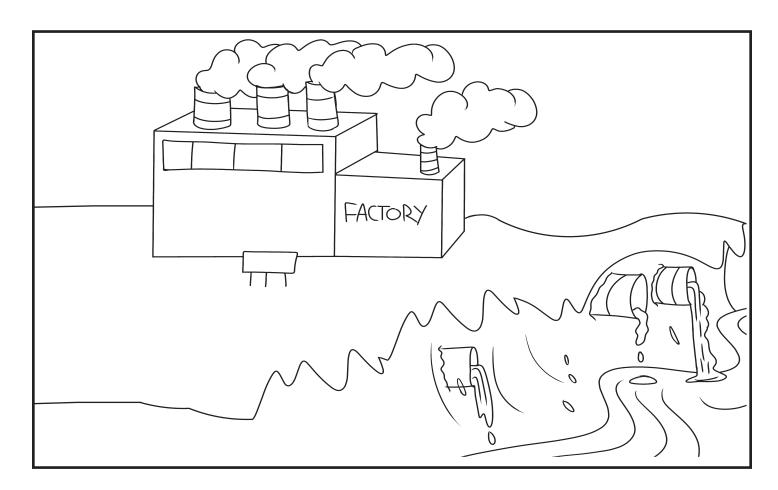


## **The Texas Clean Rivers Program**

One of the ways that the Angelina & Neches River Authority helps to manage and conserve water in our basin is with the Texas Clean Rivers Program. The Texas Clean Rivers Program (TCEQ for short) is a partnership between the Texas Commission on Environmental Quality and regional river authorities, like the Angelina & Neches River Authority.

The focus of the program is to find pollution in our water. Pollution can have negative effects on both humans and wildlife. Pollution can make people and animals sick, it can decrease the number of aquatic organisms in a river, and it can make the water unsuitable for recreation.

There are two major types of pollution that can impair water quality: point source and non-point source. Point source pollution comes from a specific point or outlet like a pipe from a factory or wastewater treatment facility. Non-point source pollution comes from many different sources across a large geographic area. An example of non-point source pollution is runoff from yards and fields that can carry pesticides, oils, herbicides, animal waste, sediments, toxic chemicals, and litter.



## **Keeping Our Water Clean**

We can help keep our water clean by minimizing non-point source pollution. Here are some things you can do to help reduce pollution and conserve water.

- I. Reduce the use of pesticides and fertilizers on your lawn. Make sure to use the minimum needed and try to find natural solutions.
- 2. Dispose of chemicals properly. Never pour hazardous waste down the drain or into your yard or street.
- 3. Don't pour used grease from cooking down the drain. Instead, store it in a jar and throw the jar away once it's full.
- 4. Don't use your toilet as a trash can. Only toilet paper should be flushed down the toilet. All other trash should be thrown away or recycled.
- 5. To save water, only run the dishwasher or washing machine with a full load.
- 6. Keep showers short to conserve water and be sure to turn off the sink, shower, or water hose when you're not using them.
- 7. Organize a stream cleanup in your community to help remove litter already in your rivers and streams.
- 8. Plant native plants along rivers and streams in your area to reduce erosion of river banks and keep sediment out of the water.
- 9. Avoid single-use products. Use a refillable water bottle and reusuable grocery bags to reduce the amount of trash that could end up in our rivers.
- 10. Contact your local river authority to report water polluters. They will be able to investigate the problem and take appropriate action.

# **Making Connections**

Answer the following short-answer questions.

| I. | What is a river basin?  |
|----|---|
| 2. | How does a river basin help support wildlife?                     |
| 3. | Why is it important to keep the water in our river basin clean?   |
| 4. | What are the two major types of pollution? Give examples of each. |
| 5. | What is the Texas Clean Rivers Program?                           |

# **Fun Facts About Our River Basin!**

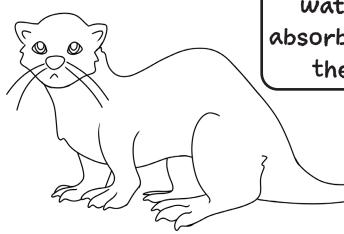
The Neches River
Basin is bigger
than the state of
Rhode Island.

Alligator snapping turtles are one of the largest species of fresh water turtle. They can weigh more than 275 pounds.

Otters can hold their breath for up to 8 minutes underwater.

Angelina & Neches River Authority

71% of the Earth is covered in water. Of that, only 2.5% is freshwater. The rest is saltwater. Only 1% of all the freshwater on the Earth is drinkable.



water. They absorb it through their skin.

Frogs don't drink

Alligators can have up to 80 teeth at a time and teeth are constantly replaced as they are worn down or broken. Over their lifetime, they can go through up to 3,000 teeth.

Rivers don't stay the same shape forever. They change shape and course over time.

The Neches
River is
approximately
416 miles long.

#### **Vocabulary Terms**

A <u>river basin</u> is an area of land where all of the surface water drains into a large river and its tributaries.

<u>Surface water</u> is water that collects on the surface of the ground. Surface water includes all of the water in lakes, rivers, streams, and runoff from rain.

A <u>tributary</u> is a river or stream that flows into a larger river.

Elevation is the height above sea level.

The term <u>aquatic</u> means something that is related to water, such as a plant or animal that lives primarily in water.

<u>Runoff</u> is water that drains from the surface of land and collects pollutants as it flows.

<u>Erosion</u> is the process where water or wind breaks down rocks and soil.

<u>Sediment</u> is an accumulation of dirt and sand.

<u>Point source pollution</u> is easily traced back to one specific source such as a pipe.

Non-point source pollution comes from many sources over a large area of land.

A <u>pollutant</u> is a substance introduced into the environment with undesired or negative effects.

An <u>impaired</u> river or stream is damaged or unable to fulfill its intended use.

The <u>Texas Clean Rivers Act</u> is a law passed in 1991 that requires ongoing evaluations of each river basin.



# **Teaching Others**

Use the space below to make an educational flyer about pollution and the importance of clean water. Use what you've learned and be creative!

# Thank You For Helping To Keep Our Rivers Clean!









ANGELINA & NECHES RIVER AUTHORITY