

Water for Texas

TWDB Kids K–12 Educational Resources

The **TWDB Kids** web portal, <http://www.twdb.texas.gov/kids>, is the gateway to the agency's K–12 educational resources. TWDB Kids features teachers' guides, visualizations, interactive games, and other activities to help students learn about key water resource concepts.

Water education begins in the school classroom. School programs can result in both short- and long-term water savings. The information students learn now is often shared with their parents and affects current water use patterns in their households. Youth educated about water resources are also more likely to make lifelong behavioral changes.

TWDB scientific research forms the cornerstone for these programs. They include units developed for specific age groups and range from coloring books for younger children to complete curricula for older students, with teachers' guides and Texas Essential Knowledge and Skills (TEKS) guidelines. Interactive web games and lessons are also featured.

Know Your Water coloring book is a popular publication that engages young children in exploring Texas water resources. It features Grandpa Lizard, Sally Mander, Amanda Armadillo, and Billy the Bull. Aimed at K–3 students, the coloring book teaches them about the importance of water resources and water conservation. The coloring books may be ordered from TWDB or downloaded from the TWDB Kids Web site.

Major Rivers is a multidisciplinary curriculum that includes a teacher's guide on CD-ROM, colorful and engaging student workbooks and home leaflets, and an introductory movie on DVD. Major Rivers, along with his horse, Aquifer, has been visiting Texas 4th and 5th grade classrooms for the past 25 years. The program teaches students where water comes from, how to protect water resources, and how to use water wisely. Major Rivers has been updated to incorporate the latest information from

the TEKS requirements for students. Student materials for Major Rivers are available in both English and Spanish language versions.

Raising Your Water IQ is an inquiry-based, hands-on approach to teaching middle school students about Texas water resources. This free curriculum has a teacher's guide and includes lessons on watersheds and pollution, water cycles, water treatment, groundwater, water in Texas, and wise water use.

Water Exploration, <http://www.WaterExploration.org>, is a web-based water education program for Texas high school students. By using a project-based learning approach, Water Exploration encourages students to conduct research and build an understanding about water science and critical water-related issues. Service learning is also incorporated into this program by challenging students and community members to conduct school water audits and implement water conservation strategies such as rainwater harvesting.

Know Your Texas Water is a resource for teachers and parents who would like to know more about Texas water. It features web quests, animations, maps, and other tools based on TWDB's research, including the State Water Plan.

Interactive Games are featured on the TWDB Kids Web site and include the following:

Who Uses Water in Texas? Almost all of the water used in Texas is consumed for agriculture, industry, and municipal uses. In this game,

players can drag the handles of a pie chart to guess the percentage of water they think each water user group uses.

Surface Water and Groundwater Players can watch rivers flood, water infiltrating an aquifer, and people being affected by droughts and floods, and can see the effects people have on water resources. Then players can test their knowledge with a vocabulary quiz!

Power of Many Players should first play the “Using Water Wisely” module. Then they can check out how many football fields of water the state of Texas uses every year, and learn how much water can be conserved if everyone in a player’s city and in the state of Texas followed those water conservation practices.

The Water Planner Game In this game, players must make sure that Texas will have enough water for the future, even in times of drought. They can learn about municipal, agricultural and industrial water use, water sources and water conservation tools.

For more information about TWDB Kids, contact conservation staff at (512) 463-7955 or consedu@twdb.texas.gov.

