

Raising Your Water IQ: A Water Conservation Program for Middle School

Introduction

Raising Your Water IQ is an inquiry-based approach to teaching middle school students about Texas water resources and how to conserve water resources for today and the future. Four messages are central to this study:

- Where does our water come from?
- Who uses water and how do we use it?
- Why and how do we conserve water?
- How can we plan our water future?

Activities and lesson plans in this program offer structured opportunities to practice the concepts in a classroom. Watersheds and surface water systems are related to groundwater systems. Point and non-point source pollution is explored in hands-on and minds-on activities. Students gather and graph data for their own water usage at home and go further to investigate water use in Texas. A “Water in Texas” web quest encourages students to ask questions and gain understanding about their own local environment.

Inquiry projects pull several lesson plans together in an open-ended exploration that offers teachers guiding frameworks for digging deeper into the four principal messages. Internet games and visualizations on the Texas Water Development Board’s web site <http://www.twdb.texas.gov/conservation/education/kids/index.asp> are included in the program to introduce and further explore concepts with students.

Students use real world maps produced by the Texas Water Development Board and other state agencies to Raise Their Water IQ. Each of these inquiry projects has service-learning extensions that offer students and teachers strategies for sharing water conservation knowledge with their community.