Teaching Sustainability through a Water Field Study

Amanda Reasoner

Synopsis

This curriculum covers the basics of water distribution on earth with an emphasis on water as a natural, invaluable and extremely scarce resource, which must be protected. Students design a service project to help raise money to fund freshwater for children in developing countries. The unit will cover watersheds and the various pollutants that enter water sources from land, such as fertilizers, animal waste and sediment. Students will learn the chemical indicators of water health (pH, turbidity, temperature, dissolved oxygen, nitrate concentration) and how to measure them. Ultimately, students will conduct a field study in which they will measure both the chemical and biological indicators in a local body of water and determine the health of the water in our area.