THE STANDARD

Distribution of Water on Earth

Describe and graph the amounts of salt water and fresh water in various reservoirs to provide evidence about the distribution of water on Earth.

DCI
DISCIPLINARY CORE IDEA

ESS2.C · The Roles of Water in Earth's Surface Processes

> *"Nearly all of Earth's available water is in the ocean. Most fresh water is in glaciers or underground; only a tiny fraction is in streams, lakes, wetlands, and the atmosphere."*

Picture all the water on Earth as 100 cups. About 97 of those cups are salty ocean water. Only 3 are fresh. And most of those 3 are frozen in glaciers or hidden underground. That leaves barely a splash in the lakes and rivers we can actually use. **5th graders take that fact and turn it into a graph that shows the sizes side by side.**

SEP
SCIENCE & ENGINEERING PRACTICE

Using Mathematics and Computational Thinking

> *"Describe and graph quantities such as area and volume to address scientific questions."*

5th graders aren't just told "most water is salty." They take real amounts and build a graph that proves it. **The skill is turning numbers into a picture, then reading that picture to answer a question about where Earth's water actually is.**

CCC
CROSSCUTTING CONCEPT

Scale, Proportion, and Quantity

> *"Standard units are used to measure and describe physical quantities such as weight and volume."*

Here's the idea 5th graders walk out with: amounts only make sense when you compare them. One liter of ocean water doesn't mean much until you line it up next to a spoonful of river water. The graph shows the proportion. **A tiny bar next to a giant bar tells the whole story.**