

# Title: Reversing Words in Water

Age Group: School Age

Submitted by: **Alicia (Holy Cross)**



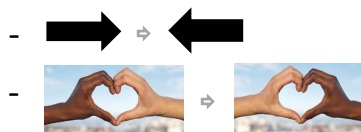
Type of Activity: Science - Refraction (Bending Light)

## Materials:

- Glass jar filled with water
- Paper
- Marker
- Word or image
- Ruler
- Tape roll (for stand)

## Suggested words/image:

- loot → tool
- boom → mood
- tin → nit.



## How to Do it:

- Fill a glass jar with water
- Draw a picture or word on plain paper (each letter should be 4x4 cm)
- Place word at least 15 cm behind the jar
- Either pull the word back and forth behind the jar for an audience or prop the paper against a stand (I used a tape roll) to see for yourself
- Watch as the word becomes a different word or the image flips (reverse pairs)

## Root Skill / Extension:

### Cognitive: 4.2 Problem-solving

This is a fun activity for your school ager to learn about refraction in physics. Experiment with liquids, distance and light to see if anything changes.

Extend the learning by researching the definitions of language terms such as: ambigrams, palindromes, density, diffraction, aperture, convergence and fiber optics.

To learn more about refraction and find out if a straw is actually bent go to:

<https://www.khanacademy.org/science/physics/geometric-optics/reflection-refraction/v/refraction-in-water>