

## THE STANDARD

# Evidence of Energy Transfer

*"Make observations to provide evidence that energy can be transferred from place to place by sound, light, heat, and electric currents."*

## DCI

DISCIPLINARY  
CORE IDEA

### PS3.A · Definitions of Energy

*"Energy can be moved from place to place by moving objects or through sound, light, or electric currents."*

This standard is all about energy on the move. A 4th grader watches energy travel four ways: sound, light, heat, and electricity. A buzzing phone, a warm sunbeam, a hot spoon, and a lamp turning on are all energy going somewhere. **Catch it traveling and point to proof.**

## SEP

SCIENCE &  
ENGINEERING  
PRACTICE

### Planning and Carrying Out Investigations

*"Make observations to produce data to serve as the basis for evidence for an explanation of a phenomenon or test a design solution."*

4th graders do not just get told that energy travels. They set something up, watch closely, and collect what they notice. The skill is turning careful watching into evidence. **When the metal spoon warms up but the plastic one stays cool, that is proof heat energy moved through the metal.**

## CCC

CROSSCUTTING  
CONCEPT

### Energy and Matter

*"Energy can be transferred in various ways and between objects."*

Here is the big idea 4th graders carry out the door: energy does not stay put. It can ride a moving object, travel as sound or light, move as heat through a material, or run through a wire as electricity. **Different paths, same idea: energy moved.**