

# CPS SCIENCE

The Next Generation

## Kindergarten

PROBLEM SOLVING

SENSE MAKING

ANALYZING

CREATING

COMMUNICATING

### **Engineering**

K-2-ETS1-1 Ask questions, make observations, and gather information about a situation people want to change to define a simple problem that can be solved through the development of a new or improved object or tool.

K-2-ETS1-2 Develop a simple sketch, drawing, or physical model to illustrate how the shape of an object helps it function as needed to solve a given problem.

K-2-ETS1-3 Analyze data from tests of two objects designed to solve the same problem to compare the strengths and weaknesses of how each performs.

### **Living and Nonliving**

K-LS1-1 Use observations to describe patterns of what plants and animals (including humans) need to survive.

K-ESS2-2 Construct an argument supported by evidence for how plants and animals (including humans) can change the environment to meet their needs.

K-ESS3-1 Use a model to represent the relationship between the needs of different plants or animals (including humans) and the places they live.

K-ESS3-3 Communicate solutions that will reduce the impact of humans on the land, water, air and/or other living things in the local environment

### **Weather & Climate**

K-PS3-1 Make observations to determine the effect of sunlight on Earth's surface.

K-PS3-2 Use tools and materials to design and build a structure that will reduce the warming effect of sunlight on an area.

K-ESS2-1 Use and share observations of local weather conditions to describe patterns over time.

K-ESS3-2 Ask questions to obtain information about the purpose of weather forecasting to prepare for and respond to severe weather.

### **Forces**

K-PS2-1 Plan and conduct investigations to compare the effects of different strengths or different directions of pushes and pulls on the motion on an object.

K-PS2-2 Analyze data to determine if a design solution works as intended to change the speed or direction of an object with a push or pull.



# **CPS SCIENCE**

## **THE NEXT GENERATION**



**PROBLEM SOLVING**

**SENSE MAKING**

**ANALYZING**

**CREATING**

**COMMUNICATING**