



ecoSTEM® Kits

An easy-to-use introduction to environmental, project-based STEM learning!

Captain Planet Foundation's ecoSTEM® Kits were curated to engage students in project-based learning, including observing phenomena, conducting inquiry investigations, making models, collecting data for citizen science projects, creating solutions to engineering challenges, and implementing environmental stewardship projects to solve real-world problems. Each kit contains supplies for 32 students and is available to teachers through [Donors Choose](#), with a limited offer from Captain Planet Foundation to provide the last half of funds needed to buy the kit.

CHOOSE FROM 4 EXCITING KITS, for use with Next Generation Science Standards, GA Standards of Excellence in Science, and state standards in 3-Dimensional Science:

EARTH Kit | 3rd - 12th grade Enriching Soils / Reducing Waste



Let's break it down for you: Mini-stream tables and soil test kits provide the tools for students to observe erosion and analyze soil composition. A drip irrigation kit offers a chance to engineer solutions in the school garden. Students can investigate decomposition with a see-through composter and minimize cafeteria waste by feeding lunch scraps to worms. Reusable snack cozies will help limit use of disposable plastics. Students will design a stewardship project to recycle, reduce waste, refuse disposables, repurpose used materials, or create compost to improve soil health.

ENERGY Kit | 3rd - 12th grade Renewable Energy



Knowledge is power and this kit sizzles with hands-on learning opportunities. Students will investigate electrical circuits by building snap-together electronic projects that demonstrate renewable energy. Invention kits provide opportunities to design and build wind, water, and solar powered devices. Students can test variables using multi-meters to measure the electricity generated by their inventions, and then refine the designs. As a class project, students will assemble a solar-powered room light and phone charger, to be shipped to students in a community without regular electrical service or with extensive outages.

WATER Kit | 3rd - 12th grade Investigating Water Quality



This amazing collection of hands-on learning tools will leave kids awash in knowledge of how their choices impact the health of the local watershed. A water cycle kit enables students to model evaporation and precipitation. Students will use the water quality monitoring kit to investigate stream health by testing physical and chemical parameters or searching for pollution-sensitive macro-invertebrates. Actual samples from the Pacific Garbage Patch will let students explore how plastic pollution affects our oceans and wildlife. Students can then design and conduct a community education project, marking storm drains to prevent dumping into local waterways.

PoliNation Kit | K - 12th grade Pollinator Learning Garden



Students will grow appreciation for pollinators by collecting data for a citizen science project with microscopes, binoculars, and bug viewers from this kit. The cargo wagon, gloves, trowels, and seeds, as well as a gift card for local purchase of a raised bed and compost, will enable students to design and build a pollinator habitat. When students plant milkweed seeds at home, they will create a monarch butterfly corridor. A butterfly rearing kit lets students observe the phenomenon of metamorphosis, and the monarch health project enables students to contribute research that may stop the decline of the monarch butterfly.

For more information, contact karan@captainplanetfdn.org