Soil Quest Overview

Project Hero is a program of the Captain Planet Foundation that challenges students to become heroes for species and ecosystems in trouble. Each Quest of Project Hero follows a QUEST framework that offers a hybrid project- and problem-based learning pathway to explore the issues, culminating in students’ design and implementation of a project that makes a meaningful difference for those species or ecosystems in their own community. As part of this process, students have an opportunity to develop and submit a project plan for consideration of up to $150 of grant funds from the Captain Planet Foundation.

Quests are designed to be flexible. You as the educator and guide are encouraged to explore the content covered in the Quest, and design the best path through it for your students. You can spend as little or as long on a step as you choose, but our testing has suggested that the longer students spend exploring the issues and the more you leave the path open to their inquiry, the richer the experience for them. Quests are staged over five Stages - Question, Uncover, Explore, Solve, Teach Others.

Scenario: The Soil Quest

**Q - Question.** All Quests start with questions, many questions, that help create the path forward. In this Quest, students will:
- start by observing their local soil in its natural habitat
- suggest a broad range of questions they are interested in answering during the Quest
- log what they already know from their observations and from their life experiences

**U - Uncover.** Here students begin answering some of their questions about soil, and organizing any clues that will help them determine how best to help the soil around you. Key questions they will want to answer include:
- What makes soil so special?
- What is soil?
- Why is soil so important?
- Why is soil in trouble?

**E - Explore.** In this stage, students will explore what practices are harming and healing soil, and discover a problem facing their local soil directly. This will help focus their inquiry and bring the
concepts to life through the lens of their local community. They will have the opportunity to investigate, observe, analyze data, read, research, interview, listen, discuss.

- Research practices that are harming and healing soil
- Survey their own community and observe what is being done to heal or help soil by answering these questions:
  - How is land used in your community?
  - How is carbon released or sequestered in your community?
  - How large is your community?
  - What is your individual carbon footprint?
- Identify local threats to soil, and choose a threat that they want to reduce.

**S - Solve.** As soil experts, students will apply their new understanding to design and carry out a solution to reduce a threat and help their local soil. Here are the steps for students to follow:

- Define the local problem you want to focus on
- Survey places nearby where you can get permission to do a project
- Compare pros and cons of possible project ideas
- Design and do your soil project

**T - Teach Others.** With new experience, knowledge, and understanding comes responsibility. How can your students share what they have learned and done with others? They should consider the following questions:

- How has this Quest changed you?
- How can you inspire your family, school, community or world to learn about and help their own local soil?
- Let Captain Planet Foundation know what you did so we can also tell others.

https://herofortheplanet.org/