

Mālama Wai Ola Program

The Tales and Trails of Ocean Trash

Grades 2-5

- No more than 50 students may participate
- Lessons one and two are to be combined into one classroom visit
- Students will be given a pretest at the beginning of the classroom visit and a post test will be given after the last visit. The post test is to be completed in class or as homework and returned to us.

Lesson One: An introduction to the *Mālama Wai Ola Program* and the instructors. A poster board presentation on trash and its effects on the ocean as well as

Lesson Two: Board game and hat creations. We will create visors using trash the instructors will provide which the students will wear to become the life size game pieces in our very own board game. After the hats are completed we will set up a game board either outside in a cemented area (where sidewalk chalk maybe used) or in an open area in the classroom.

Hualālai Site Visit

We will do a short beach clean up along the shoreline. We will divide up into groups and see who can pick up the most trash. We will then take counts on the type of trash we find and how much (by weight).

Lesson Three: The students will use the information we collect to make graphs. This will give them a visual to see the results of our work. They may use a computer program or they may create their own.

Grades 7-10

Lesson One: An introduction to the *Mālama Wai Ola Program* and the instructors. A poster board presentation on trash and its effects on the ocean. We will also have a Power Point presentation on currents and the famed Nike shoe spill of 1990.

Lesson Two: We will then complete a worksheet (adapted from http://seawifs.gsfc.nasa.gov/OCEAN_PLANET/) on the Nike shoe spill called “The Nike Shoe Investigation.” We will plot the path the shoes took while catching a ride on the ocean currents. After plotting the path of the shoes the students will answer the questions on the work sheet.

Hualālai Site Visit

We will do a short beach clean up along the shoreline. We will divide up into groups and see who can pick up the most trash. We will then take counts on the type of trash we find and how much (by weight).

Lesson Three: The students will use the information we collect to make graphs. This will give them a visual to see the results of our work. They may use a computer program or they may create their own. Based on what the students find they can also hypothesize where the trash came from and how it got on the beach.

Lesson Four: Students will be assigned to do a research project on their own to look more thoroughly at the effects of ocean trash. The students have a choice of investigating a specific place or phenomenon (i.e. the pacific garbage patch), a specific type of trash (plastics, glass, oil, etc.), or how trash travels in certain areas. These projects will be presented in class and turned into instructors as a posttest.