

The Micro-Plastic Problem

Where does Micro-Plastic Come From?



- Micro plastic comes from broken down plastic
- The U.S. produces 30 million tons of plastic every year
- Plastic is ending up in our ocean.

What Plastic Is doing in our Oceans?





- Micro-plastic is invading the ocean
- Animals mistake the Micro-plastic for food
- Sea creatures swim into nets and ropes and get entangled and die.

Kalama Beach Micro-Plastic Invasion Investigation Project







- Measure plot distance 10' by 10'
- Measure distance from water line
- Measure approximate tide level
- Measure approximate wind speed
- Measure amount of micro-plastic collected

Additional Micro-Plastic Survey

- Ten test holes were dug in-between student survey plot.
- None of the test holes revealed any micro-plastic below the surface of the beach sand more than 3 inches deep.
- The density of the micro-plastic prohibits its downward migration, so beach clean up will be less complicated and less expensive.



Beach Clean up Data Collection-Day One

0 11/30/12

○ Tide level: 1.0

Wind speed: 0

Plot distance from water line: 30ft

Plastic we collected: 0.5L

 There is 1544 of visual gallons or 5845L on Kailua Beach





Beach Clean up Experiment Data Collection-Day two

0 12/14/12

o Tide level: .98ft

Wind speed: 15/25

Plot distance from water line: 18ft

Plastic collected: .75L

 5106 visual gallons or 19,329L on Kailua Beach



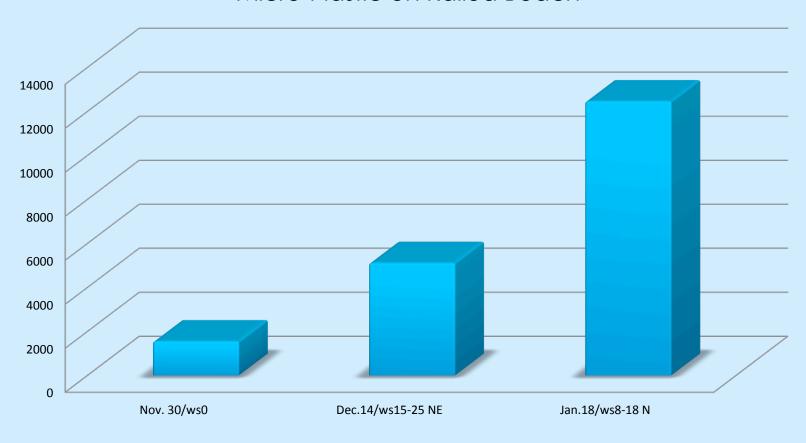


Beach Clean up Experiment Data Collections-Day Three

- 0 1/18/13
- Tide level: .33ft
- Wind speed: 8/18
- Plot distance from water line: 40ft
- Plastic collected: 3.75L
- 12,454 visual gallons47,104L on Kailua Beach



Micro-Plastic on Kailua Beach



What Micro-Plastic will Do Long Term For Kailua



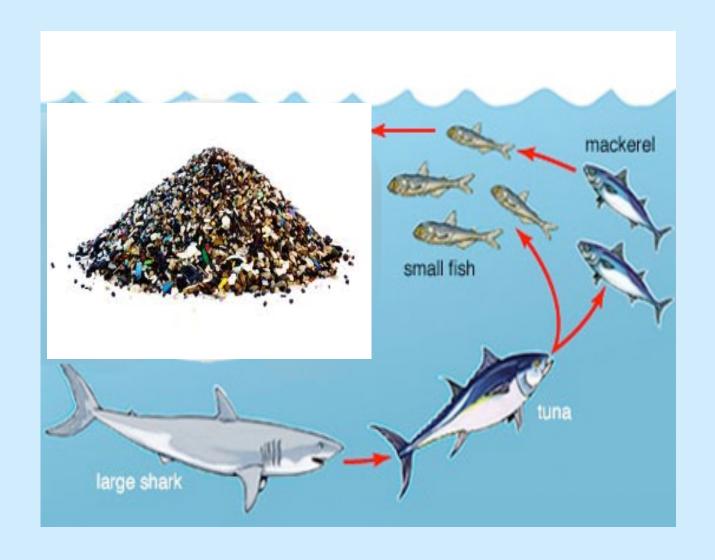


Where would you visit?

- Revenue will go down
- Less finical help from Tourist
- Releases toxins into the ocean
- Reduces fish population



Long Term Effects on the Food Chain From Micro-plastic



Purpose of our study



The Solution To The Problem

- Reduce, Reuse, and Recycle
- Start using biodegradable products
- Clean up the plastic you see on the beach
- Volunteer for beach clean ups in the community

