

# GYRE

The Plastic Ocean  
ON VIEW FEB 7 - SEPT 6, 2014  
at the Anchorage Museum

HUMAN CONSUMPTION



ENVIRONMENTAL CHANGE



ARTISTIC INVESTIGATION



# EXHIBITION OVERVIEW

**GYRE** The Plastic Ocean tells a global ocean debris story through the work of more than 20 artists from around the world. The exhibition includes a section specific to Alaska featuring a 2013 expedition's resulting scientific discoveries, as well as art created from the ocean trash gathered on Alaska's beaches during the journey.



## WHAT IS A GYRE?

A gyre is a swirling vortex. The surface circulation of our oceans is dominated by gyres that may be hundreds to thousands of miles in diameter. It is these gyres that re-distribute and aggregate debris in our oceans. Alaska's shores are the northern fringe of the North Pacific Gyre.

## GYRE EXPEDITION AND EXHIBITION

A team of scientists and artists explored the coast of Alaska and collected plastics most likely deposited from the North Pacific Gyre. This expedition and exhibition explores the relationship between humans and our ocean.

## PLASTICS AND OCEAN TRASH

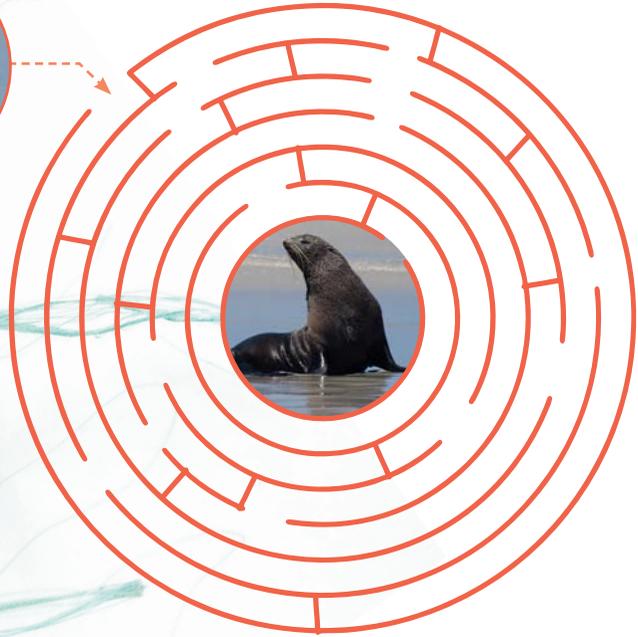
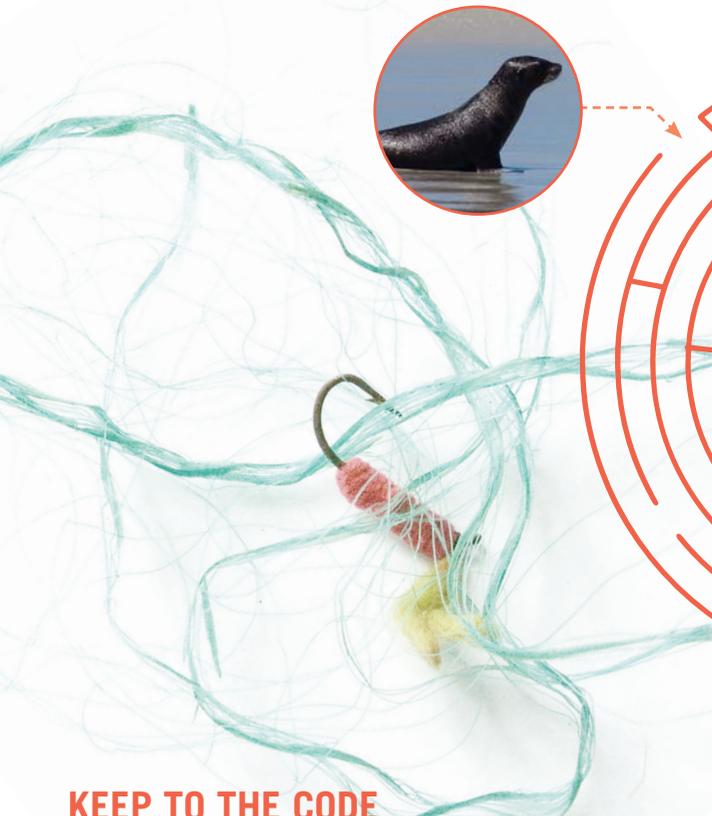
“ Plastic is one of the main types of **OCEAN TRASH**. Plastics are used in many aspects of daily life and are a big part of our waste stream. Plastics can last a long time. ”

*-What We Know About: Plastic Marine Debris, NOAA*

Plastics can end up in the ocean in many ways. They may fall or be dumped off a ship, travel down rivers or through storm drains, blow out of trashcans, or be left on the beach. Once plastics are in the ocean, they can drift for thousands of miles.

# GYRE MAZE

Help the seal pup navigate the gyre and reach its mother.



## KEEP TO THE CODE

The scientific names of specific plastics can be a mouthful. These names state the chemical makeup of the plastic and are sometimes printed on the plastic. The names are shortened for ease.

**Draw a line to match the short version and symbol with the scientific name.**

ANSWERS:

PET 1 (PETE) is poly(ethylene terephthalate)  
HDPE 2 is high-density polyethylene  
PVC (V) 3 is poly(vinyl chloride)  
PS 6 is polystyrene



HDPE

Polyethylene terephthalate  
(example: soda bottles)



PS

High-density polyethylene  
(example: detergent bottles)



(PET) PETE

Polyvinyl chloride  
(example: credit cards)



(PVC) V

Polystyrene  
(example: take-out food containers)

Plastics must be sorted before they can be recycled because they aren't all made of the same chemicals. Look for the plastic codes for help with sorting or check your local recycling center for more information. **Learn about recycling in Anchorage.**



# HOW DOES OCEAN TRASH AFFECT YOU?



Currently there is no accurate estimate of how much plastic debris is in the ocean. We do know that no matter the amount, it has an impact on humans and the environment.

**What impacts you the most? Why? Circle the answers below and discuss with your family.**

Eyesore on beaches

Human health and safety

Wildlife entanglement

Brought into nests

It can look appetizing to animals

Other: \_\_\_\_\_

\_\_\_\_\_

## HOW LONG?

**How much time will it take for these items to degrade in the ocean?**

Plastics will degrade into tiny pieces until you can't see them anymore. Most commonly used plastics do not "go away" in the ocean. They break down into smaller and smaller pieces.

Possible answers:

undetermined (**U**), many years (**MY**), a few years (**FY**), a few months (**FM**) and a few weeks (**FW**).



plastic bottle



cigarette filter



apple core



styrofoam cup



fishing line



aluminum can



milk carton

ANSWERS: plastic bottle = many years/undetermined, cigarette filter = many years, apple core = a few weeks, styrofoam cup = many years/undetermined, fishing line = many years/undetermined, aluminum can = many years, milk carton = a few months

# CLEAN UP THE RIGHT WAY

Fill in the vowels to find out what you should do when you see ocean trash.

## B █ C █ R █ F █ L

Take care in approaching any debris. Some plastic debris may contain hazardous material and will need an expert to remove it. Contact local authorities for help with that kind of trash.

## G █ R █ B █ T

If an item is safe and small enough to carry, pick it up. Be safe and check to make sure there are no sharp edges on ocean trash.

## T █ S █ S █ T

Dispose of trash properly and recycle what you can.

## R █ P █ R █ T █ T

Download the free Marine Debris Tracker app ([www.marinedebris.engr.uga.edu](http://www.marinedebris.engr.uga.edu)) or let your local NOAA agency know about it.

ANSWERS:

Be careful, Grab it, Toss it, and Report it  
Source: Japan Tsunami; Marine Debris, NOAA

## THE PLASTIC CHALLENGE

The next time you are at the grocery store, try finding items on your list that don't contain plastic in any way. That means without plastic packaging or labels. See what you can find.

- Purchase a metal water bottle
- Recycle your paper lunch bag
- Store food in glass containers
- Reuse your grocery bags

Do you have an idea for an alternative to plastic containers?

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# WHAT CAN YOU DO?

**REDUCE** the amount of materials you use.

**REUSE** your plastic items.

**RECYCLE** any materials that you can- glass, paper, plastic, etc.

**RETHINK** our relationship with plastic.

**RESOURCES** Anchorage Museum, [www.anchagemuseum.org/gyre](http://www.anchagemuseum.org/gyre)  
National Oceanic and Atmospheric Administration (NOAA), [www.noaa.gov](http://www.noaa.gov)  
Alaska SeaLife Center, [www.alaskasealife.org](http://www.alaskasealife.org)  
Centers for Ocean Sciences Education Excellence, [www.cosee.net](http://www.cosee.net)  
Center for Alaskan Coastal Studies, [www.akcoastalstudies.org](http://www.akcoastalstudies.org)  
Ocean Conservancy, [www.oceanconservancy.org](http://www.oceanconservancy.org)

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Pages 2 to 5: Marine debris in Hanauma Bay, Hawaii, NOAA; Northern fur seal adult female and pup in the surf, Eric Boerner, NOAA; Elizabeth Leader, "Plastic Reef," pencil drawing; Susan Middleton, "Shed Bird Stomach Contents," photograph, 2004  
Back Cover: iStockphoto.com

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