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## Pictured: One Sea Turtle's Worth of Plastic

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Joining the Laysan albatross as icons of ocean plastic pollution are sea turtles, which consume bellyfuls of debris while swimming through Earth's five great ocean garbage patches.

Pictured above are the stomach contents of a juvenile sea turtle accidentally captured off the coast of Argentina. The image echoes famous photographs taken by <u>Chris Jordan</u> and <u>Susan Middleton</u> of decomposing albatrosses on the island of Midway.

About 0.25 percent of all plastic <u>ends up in the ocean</u>. That might not sound like much, but humanity produces about 260 million tons of plastic a year. Tiny fractions add up fast. Oceanic plastic is pulled into the center of rotating currents, or gyres, where it doesn't degrade, but breaks into smaller and smaller pieces. Some pieces end up in plankton and algae, or drift to the ocean floor. Others are mistaken for food by turtles.

The phenomenon is described in a <u>new research review</u> (.pdf) published by the <u>Global Sea Turtle Network</u> and spotlighted by the fifth <u>International Marine Debris Conference</u>, now ongoing in Honolulu, Hawaii.

One anecdote in the article, written by biologists Wallace Nichols of the California Academy of Science and the University of British Columbia's Colette Wabnitz, stands out. "Relief of gastrointestinal obstruction of a green turtle off Melbourne beach, Florida, resulted in the animal defecating 74 foreign objects over a period of a month, including four types of latex balloons, different types of hard plastic, a piece of carpet-like material, and two 2- to 4-mm tar balls, they wrote.

Like so many environmental problems, ocean plastic seems overwhelming. But countries like China, South Africa and Thailand are already taxing or banning single-use plastic bags, which pose the greatest threat to turtles.

Individuals can help by cutting back on bag and bottle use, and finding ways to avoid plastic. Someday, perhaps, humanity might quit throwing away plastic altogether. Wrote Nichols, "There is no stopping the ingenious human mind."



Images: 1) Debris found in the gastrointestinal content of a juvenile green turtle accidentally captured in Bahía Samborombón, Argentina./Victoria González Carman. 2) Loggerhead turtle./Damien du Toit, Flickr.