

Optimizing marine waste collection from space

The situation

250 kg of plastic leak into the ocean each second - the equivalent to a garbage truck.

In fact, an FAO report concerning plastic pollution, published in 2019, estimates that 5 billion pieces of plastic are currently floating in our seas.

If this continues, the ocean is expected to contain more plastics than fish by 2050.

The solution

CLS and its partners have developed a unique approach to provide a solution using space technology that not only optimizes plastic collection along coastlines and at sea but is also capable of identifying sources of pollution, providing stakeholders with the necessary tools to fight against plastic pollution





Knowledge at the Heart of your Decisions



SATELLITE TRACKING

Track marine plastic in near realtime with this dedicated Argos/GPS trackers able to provide up to 96 positions a day.

Hundreds have already been deployed in polluted ocean stream to better understand and better fight this plague.



DRIFT MODEL

Estimate where plastic will accumulate with our numerical drift model combining surface current and wind models.

Use this model in retrofit/reverse mode to identify a source of pollution.



DECISION MAKING TOOL

Display satellite tracks combined with meteorological and oceanographic data and run drift simulations via our dedicated web portal to identify accumulation points and optimize waste collection.





CLS

CLS, a subsidiary of the French Space Agency CNES and of CNP, is a worldwide company and pioneer provider of monitoring and surveillance solutions for the Earth since 1986. Its mission is to deploy innovative space-based solutions to understand and protect our planet, and to manage its resources sustainably.



+35

Years of experience

90

In-house oceanographers

With solid expertise in Earth Observation, remote sensing, web development, database management, and an operational infrastructure for 24/7 processes, a pool of experts in ocean sciences and a permanent team of analysts on duty, CLS is able to provide a reliable and operational service to track macro-plastics in the ocean.

Our solution supports decision-making to governmental and nongovernmental agencies involved in monitoring, evaluating, mitigating or tackling the recurrent plastic environmental issue: Meteorological Offices, Coast Guards, Navies, Port Authorities, Marine Park managers, scientists, NGOs, Touristic organizations.





