SUPPLYFRAME
DESIGNLAB
HACKADAY PRIZE 2020

Conservation X Labs

Conservation

The Mission

Conservation X Labs' mission is to end the global extinction crisis through the democratization of science, mobilizing new talent to work on extinction and climate crises, and ultimately, delivering scalable and impactful solutions. Current trends indicate that endangered species extinction rates may be 1,000-10,000 times greater than background rates.

The Work

Over the past five years, Conservation X Labs' open innovation program and Garage program have inspired and implemented bold ideas for new environmental solutions. Through their grand challenges and prizes for conservation, they have brought together thousands of brilliant individuals from around the globe to develop hundreds of innovations.

The Garage program aims to deliver highly impactful technologies needed in the conservation field, including a platform for bringing user-defined artificial intelligence capabilities to environmental tools such as remote cameras (the Sentinel System), and a low-cost, field ready, handheld DNA analysis tool (the DNA BIT).

Open Challenge

Combating Invasive Species: Global travel and trade leads to the introduction of non-native species in novel habitats around the world. Not all non-native species cause harm, but ones that outcompete native species can cause significant damage to local biodiversity,agricultural crops, and local economies Prominent examples include Lionfish in the Atlantic Ocean, Cane Toads in Australia, Burmese Pythons in Florida and Feral Pigs worldwide.

This challenge seeks new globally scalable systems and technologies that aid in the monitoring, prevention, and systematic removal of invasive species in aquatic ecosystems or on islands.

New Tools For Marine Protection: Protected areas in the ocean, unlike a forest patch, are far more difficult to manage and face increasing challenges, especially as they expand to enforce boundaries and policies with no observable boundaries or protective barriers to the sea. By enabling quality data collection and monitoring and surveillance of marine environments, important ocean habitat can be better managed, guarded against threats, and protected for conservation and sustainable fishing, etc.

This challenge seeks methods for real-time monitoring of everything on or below the water with surveillance technology and data analytics designed for affordability and autonomy within the developing and developed world.