## **Cooperative Autonomous ScanEagle**



## What

- UAS manpower limitations constrain the Navy's ISR capabilities
- Expand the Navy's capacity to FIND/FIX with less personnel
- Reduce the cognitive load on the operator
- Utilize autonomous path following to provide optimal routes for ISR missions
- Automate the locating of targets in the Information Operations (IO) and Intelligence, Surveillance and Reconnaissance (ISR) domains

## How

- Further evolve the ScanEagle Command and Control Application Programing Interface
- Develop Camera Sensor Application Programing Interface

CRUSER

- Integrate Sensor and C2 Application Programing Interface
- Establish a set of predetermined optimal routes (Templates) that consider the Aircraft and Sensor dynamics.

## Objective

- Achieve autonomous behavior of a single ScanEagle UAV
- Advance combined cooperative and autonomous behavior of at least two ScanEagle UAV's
- Evolve the ScanEagle secondary controller
- Develop cooperative behavior using multiple ScanEagle UAV's
- Improvements to ISR payloads to enable their C2 of the Aircraft





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