



U.S. Coast Guard Unmanned Systems



USCG Assistant Commandant for Capability
CAPT Thom Remmers (CG-7 UxS)

Unmanned Aerial Systems (UAS)



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Long-Range UAS

- Wide area surveillance for the Area Commander
- Beyond Radio Line of Sight C2 link (SATCOM)
- Long endurance



FL250

Medium-Range UAS

- On demand support for the Tactical Commander
- Beyond Visual Line of Sight C2 link (Radio)
- Medium endurance



5000'

Short-Range UAS

- Personal, portable system
- Visual Line of Sight C2 link (Radio/Wifi)
- Short minute endurance



400'



Long-Range UAS (LR-UAS) – Joint Program



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Medium Range-UAS (MR-UAS)



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Short-Range UAS (SR-UAS)



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Unmanned Surface Vessels (USV)



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Unmanned Underwater Vehicles (UUV)

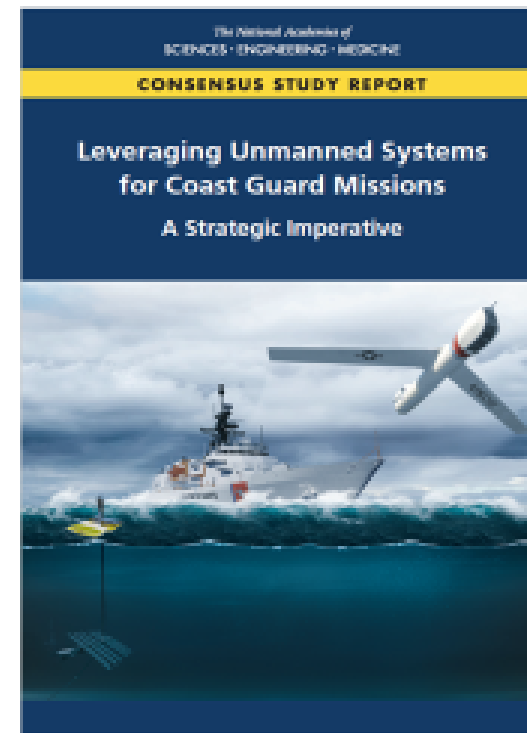


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Why Unmanned Systems (UxS)?

The Need for a New Approach

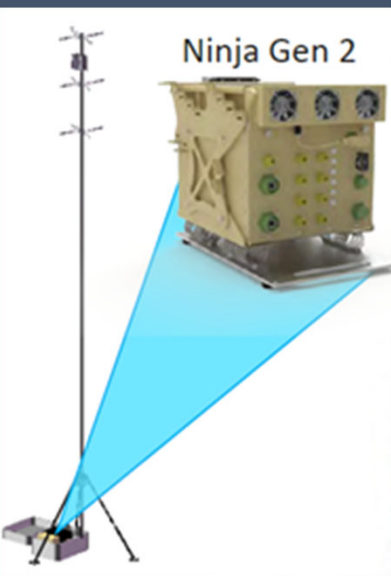
1. Issue a high-level UxS strategy
2. Designate a top Coast Guard official to advance strategy
3. Establish a UxS program office
4. Expand and normalize efforts to ensure ample and systematic operations-related experimentation
5. Commission an internal study of the multi-year spending that will be required for UxS



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Why Shift to UxS Construct?



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A Future State: More than a Vehicle & Sensor

Depending on the definition of an “unmanned system”, these systems are envisioned to become the “eyes and ears” of our operators. As a result, we expect them to evolve into only one element of a much larger ecosystem and dependent on the development and implementation of other critical enabling technology elements:

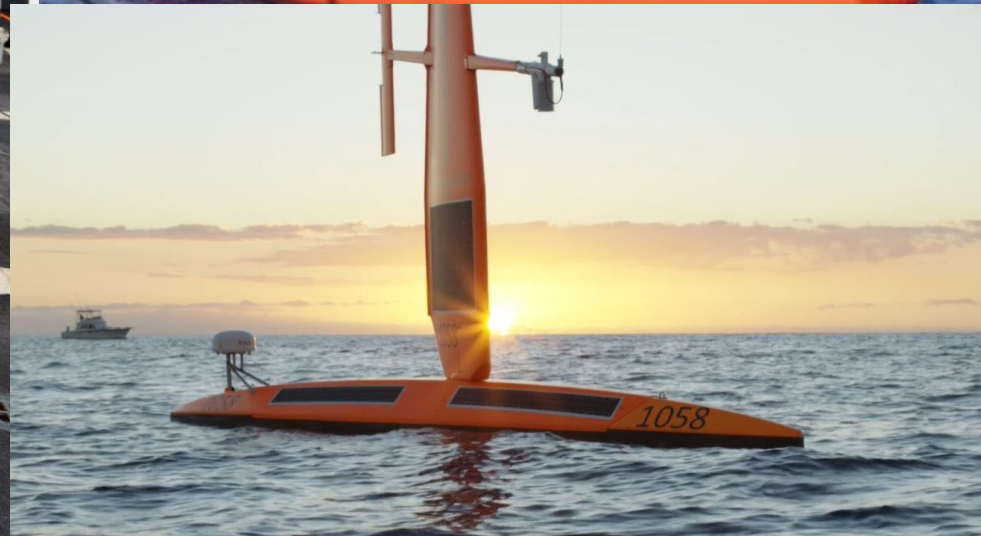
- “Edge” communications network: Execute command & control of vehicles and sensors over longer range. Transmit sensor data ashore for storage and analysis.
- Data management platform: Store, archive, and provide access to sensor data based on a range of operational needs.
- Analysis capability: Analyze larger volume of newly acquired data including real-time detection or retrospective “pattern of life” or forensic analysis.



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Questions?



Thank You

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