



**L3HARRIS™**  
FAST. FORWARD.

**ENABLING BEYOND  
VISUAL LINE OF SIGHT  
(BVLOS) OPERATIONS**







# OPENING THE SKIES TO DRONE COMMERCE

The global unmanned aircraft systems (UAS) industry is forecasted to be a \$100B sector by 2026 generating 100,000 jobs in research, manufacturing and services. However, a high-performance, aviation-grade network is required for the industry to take off.

## THE CHALLENGE

Most UAS operations are currently limited to short distances within the remote pilot's line of sight. Unlocking the benefits of UAS technology for applications as varied as critical infrastructure inspection, precision agriculture, public safety and package delivery, requires a reliable, scalable, integrated solution for BVLOS operations.

## THE SOLUTION

L3Harris developed the first multi-use, broad-purpose network of technologies that enables commercial UAS to fly much farther and safer BVLOS in national airspace: The L3Harris UAS Network.

## THE L3HARRIS UAS NETWORK

The L3Harris UAS Network is a system of safety-critical technologies, including sensors, radios, displays, communications equipment and software, that form a complete solution for commercial drone operations. This network of integrated technologies and services connects remote pilots with unmanned aircraft operating tens or hundreds of miles away — in real time. Once deployed, the L3Harris UAS Network provides complete situational awareness of the airspace, as well as the mission-critical command and control (C2) data link required to maneuver, control and monitor unmanned aircraft over long distances. The L3Harris UAS Network is defined by exceptionally high levels of operational performance, reliability and resilience.



## BENEFITS OF A UAS NETWORK

- > Enables safer, more efficient critical infrastructure inspection
- > Improves quality of life by transforming the way governments deliver services and respond to emergencies
- > Powers next-generation transportation services, such as UAS package delivery and urban air mobility
- > Uses existing infrastructure to quickly, safely enable UAS operations
- > Generates high-paying, high-tech jobs sought by the 21st century workforce

## COMMERCIAL UAS USERS & APPLICATIONS - SAVING TIME, MONEY AND LIVES

- > Oil and gas
- > Utilities
- > Railroads
- > Drone ports
- > Governments
- > Insurance
- > Package delivery
- > Precision agriculture
- > Public safety
- > Emergency management
- > Search and rescue
- > Mapping

## DID YOU KNOW?

- > L3Harris air traffic management technology helps every flight in the U.S. depart and arrive safely
- > L3Harris has been a trusted partner of the FAA for more than three decades
- > Every U.S. GPS signal relies on L3Harris technology
- > L3Harris works hand-in-hand with the FAA to deliver NextGen, a federal program designed to create more efficient airways, reduce delays and better manage air traffic and fuel costs, all while lowering carbon emissions

## UAS SERVICES

L3Harris' surveillance, detect-and-avoid and communications solutions represent the industry's leading suite of integrated aviation-grade, safety-critical services that make BVLOS operations possible. The L3Harris UAS Network provides the following key services required by the Federal Aviation Administration (FAA), the UAS industry's safety regulator, for safe and efficient BVLOS operations:

### Airspace Surveillance

L3Harris' RangeVue™ Pro surveillance system is the first airspace situational-awareness tool designed specifically for BVLOS operations. It provides real-time, precise surveillance of the operational airspace allowing UAS pilots to complete their missions safely and efficiently, while staying clear of manned aircraft traffic.

### Detect-and-Avoid

RangeVue Pro employs advanced algorithms to project potential collisions with manned aircraft. It generates graduated alerts to UAS pilots and recommends a range of evasive maneuvers for safe avoidance of those collisions.

### Command-Non-Payload-Communications (CNPC)

The L3Harris CNPC radio system and link service are the first aviation-grade communications solutions for BVLOS operations. Our radio system operates

in the protected aeronautical C-band spectrum and is aligned with the requirements of the RTCA's SC-228 MOPS and FAA's TSO-213.

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**THE L3HARRIS UAS NETWORK — LIKE WATERWAYS, RAILROADS AND HIGHWAYS — CREATES THE ESSENTIAL TRANSPORTATION INFRASTRUCTURE FOR BUSINESSES AND COMMUNITIES TO GROW AND PROSPER.**

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## COMMERCIAL UAS SOLUTIONS

The L3Harris UAS Network, along with L3Harris' other commercial UAS solutions, enables the integration of UAS into the National Airspace System (NAS) for BVLOS operations that save time, money and lives. Our offerings include airspace characterization services, the L3Harris NAS-wide air traffic surveillance data feed, commercially-available cooperative and non-cooperative surveillance sensors, software applications for UAS operations support, and engineering services for design and deployment of airspace systems. L3Harris technologies enable safe and routine BVLOS operations in a complex and crowded airspace.





**FAST. FORWARD.**

Enabling Beyond Visual Line of Sight (BVLOS) Operations — The L3Harris UAS Network

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