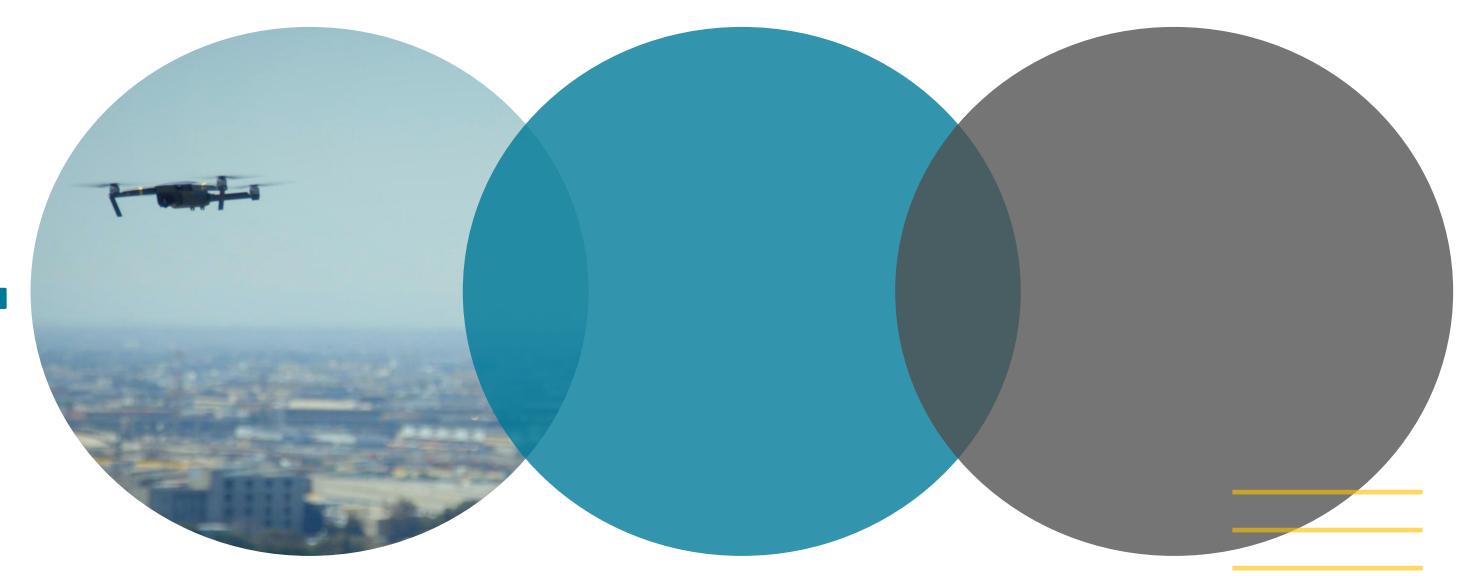


AIR MOBILITY URBAN LARGE EXPERIMENTAL DEMONSTRATIONS



Objectives

SAFE INTERACTION OF UAM WITH OTHER AIRSPACE USERS

• AMU-LED will define and test U-space services and technologies to provide means to coordinate and safely integrate UAM operations with other Air Space Users, including manned aviation and ATC.

SAFE UAM FLIGHT

• AMU-LED will explore the requirements of UAM platforms to fly and safely navigate, safely even in complex urban environments, considering the impact of buildings both, in surrounding air streams and in multipath effects on electromagnetic signals-in-space that provide guidance (e.g., GNSS) and communications (e.g., 4G/5G) to UAM platforms.

AIM

AMU-LED demonstrate that any city or urban region (e.g., sparsely populated areas) may have the capability to offer UAM services and infrastructures considering its specificities, although in a standardized and safe form. Finally, this project will significantly contribute to define the needs and features of the Unmanned Aerial Vehicle (UAV) on-board equipment.



Demonstrations

CRANFIELD (UK) JUNE 22

Providing test of all developed technologies at U-Space, ATM/UTM integration and U-Space Service U1-U4.

RANDSTAD (NL) AUGUST 22

Making use of different testing locations in Randstad, AMU-LED will showcase a safe integration of Urban Air Mobility in urban environments.

SANTIAGO DE COMPOSTELA (ESP) SEPTEMBER 22

Testing CIS and U-space services to coordinate manned and unmanned Traffic.

UAM SAFETY REGULATIONS

- 1. Categories of unmanned aircraft
- 2. Hobby flying and as part of a model flying club.
- 3. Indoor vs outdoor flying.
- 4. Commercial drone operations.
- 5. Drone operations in rural and urban areas.
- 6. Drone operator and flyer registration is required for anyone flying a drone 250g or more on an annual basis.

Expected Impact SAFETY IMPACT SAFETY IMPACT

- Maintain aviation safety levels. Definition of UAM missions and scenarios, and related safety assessment according to SORA methodology (ARC, GRC).
- Development of international standards, AMC and legislation for Urban Air Mobility.

ENVIRONMENT IMPACT

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- Smarter and more sustainable cities and air transport.
- Decrease the overall environmental footprint.



SOCIAL IMPACT

- Decrease the time in door-to-door travel or in case of emergency interventions.
- Obtain metrics for social acceptance defined and verified with a widely representative Advisory Board.

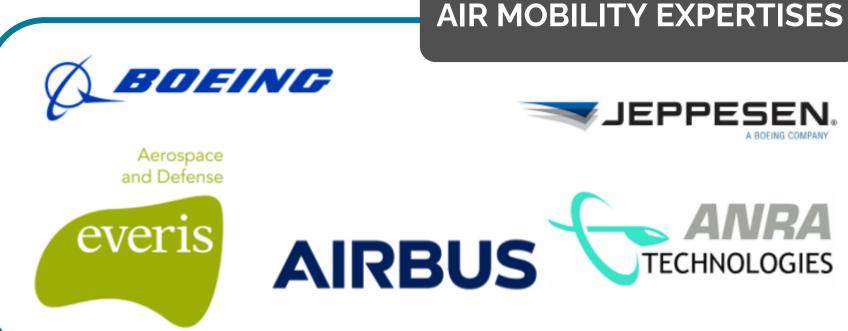
Partners

RESEARCH ORGANISATIONS













Key facts







SESAR *

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