

RPAS and ATM Integration

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In the Weeds?



Photo:www.wimsworld.wordpress.com

What is Air Traffic Control?

- Annex 11?
Air Traffic Services
 - PANS-ATM
- Annex 2?
Rules of the Air
- Annex 6?
Operation of Aircraft
 - PANS-OPS





Air Traffic Control Service

A service provided for the purpose of:

a) preventing collisions:

1) between aircraft, and

2) on the manoeuvring area between aircraft and obstructions; and

b) expediting and maintaining an orderly flow of air traffic.



Air Traffic Control

Fundamental relationship between air traffic controller and pilot that allows for the execution of instructions that provide for the prevention of collisions between aircraft and to expedite and maintain an orderly flow of traffic.

The details of this relationship are spelled out in the Annexes and PANS.



Separation Standards

- Hundreds of different standards depending on the condition
- The distance between aircraft required in a given condition of Communication, Navigation and Surveillance, determined through collision risk modelling, that will ensure the aircraft will not collide with one another.



A New Question

So the question is not about the UAS, but rather:

What capabilities are required on an aircraft that are necessary to maintain the fundamental relationship between controller and pilot that is the foundation of air traffic control?



ATM with Integrated RPAS

- **Remotely Piloted Aircraft Systems (RPAS) operating in non-segregated airspace shall have the same division of responsibilities and liabilities between pilot and air traffic controller as manned aircraft. Whether the pilot is onboard or in another location should be irrelevant for the purposes of air traffic control.**



Questions?

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