UAVs Supporting UN Operations: The MDA Service Model

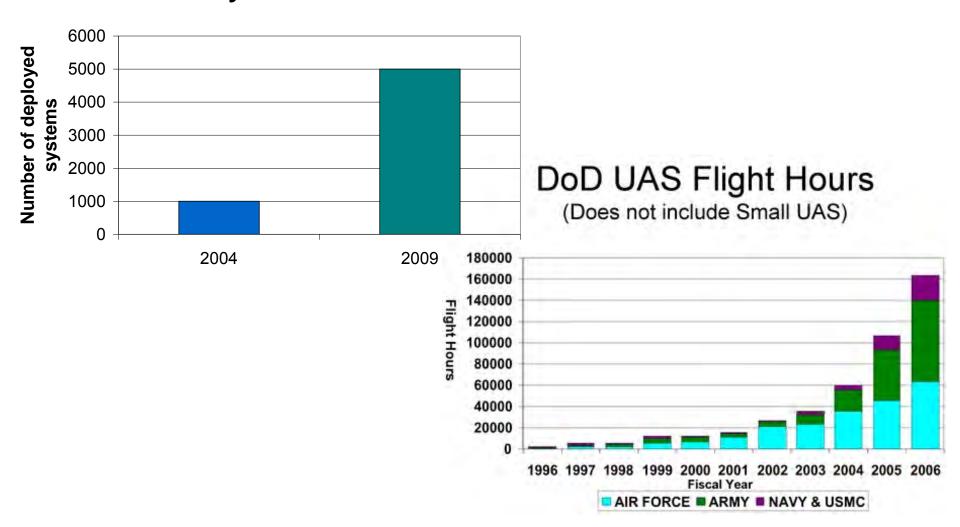
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Outline

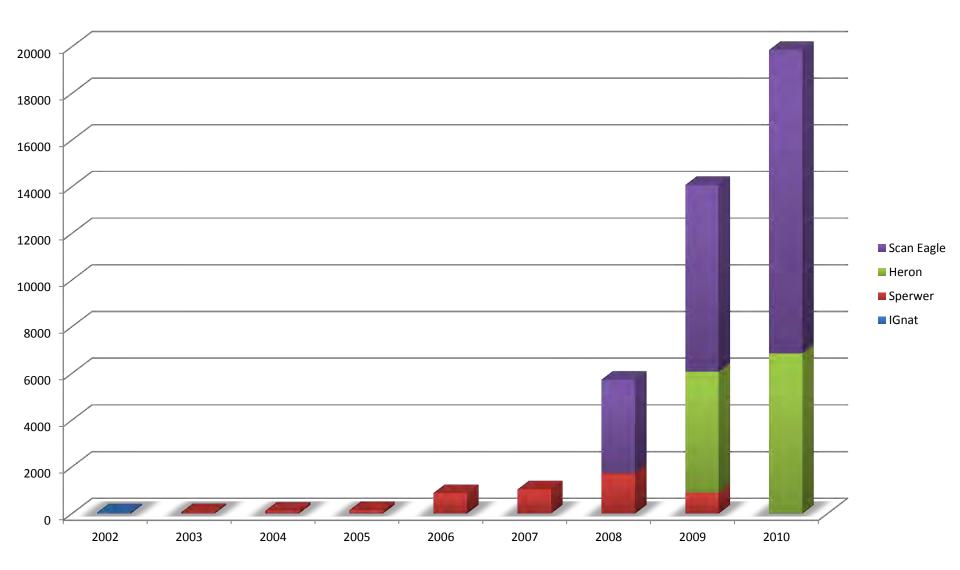
- The growing importance of UAVs to military operations
- Applicability of UAVs to UN operations
- The MDA service model and how it could be applied to UN operations
- Associated challenges

UAVs: A Critical Asset in Contemporary Military Operations

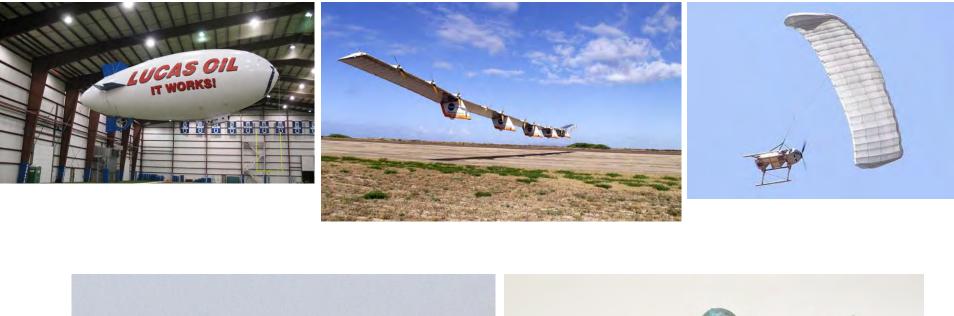
Deployed Unmanned Aerial Systems

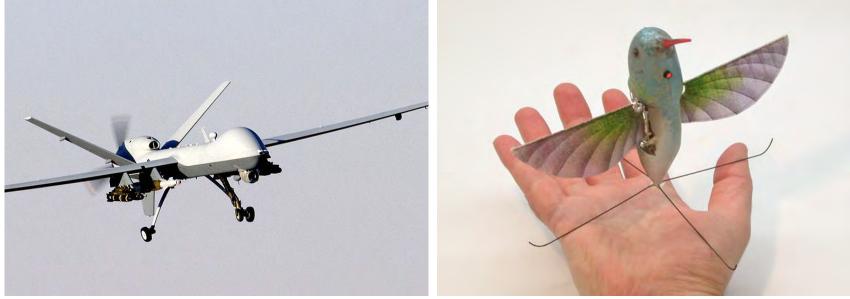


CF UAV Operational Use



Diversity of UAVs





Decision superiority is the competitive advantage enabled by ongoing **situational awareness** ...

In essence, Sense is about providing a perception of the "state of the world" to a commander in order to enable him to make decisions and to optimize the other functions. Sense ultimately provides commanders the knowledge necessary to direct their forces to achieve the most appropriate effect on the operational environment.

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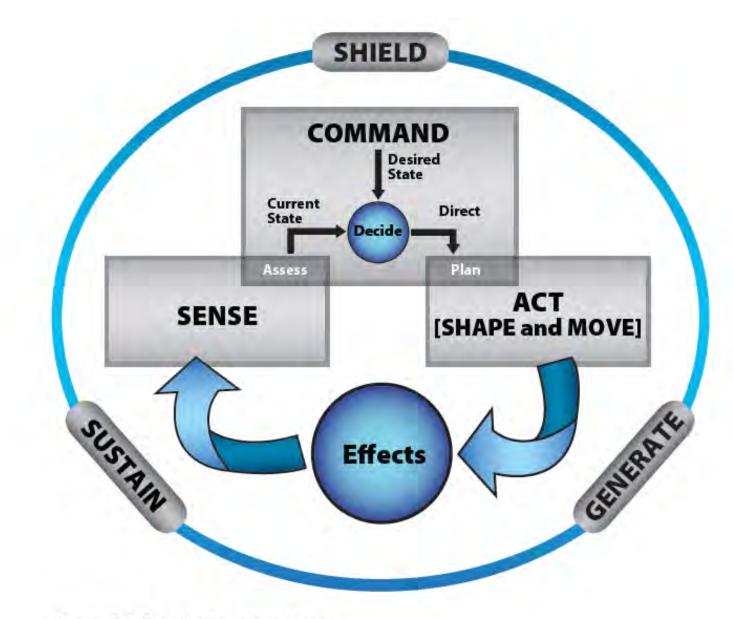


Figure 5-1. The Air Force Functions



UAVs Could Support a Broad Range of UN Operations







Persistent Ubiquitous Dynamic No Operator Risk











UAVs for improving Situational Awareness







UAVs for improving Situational Awareness in Complex Missions









UAVs for Situational Awareness in Maritime Missions



MDA's Service Model and Operations



Noctua and Nankeen:

- MDA provides UAV systems, training, maintenance and supply chain.
- Customer provides pilots and payload operators.
- >20,000 operational flight hours generated since Jan 2009 in Afghanistan.

Persist-INT:

- MDA provides complete turnkey service including pilots and payload operators.
- Afghan civil flight permit.



MDA's Operations at KAF



"January 2009, Heron started flying operationally as our eye in the sky. It sits very high and gives us the ability to see what the enemy is doing so we can manage the battlefield properly. It's a very reliable platform and it's saving a lot of lives."

Col. C. Drouin, Canadian Air Force

UAVs for UN Operations

 Although UAVs could make a valuable contribution to UN operations, most nations do not have them.



 Should the UN centrally fund UAVs in the same way it has in the past secured airlift?



- Not necessarily a military fielded capability.
- UAVs through a service contract:
 - Rapidly deployed.
 - No capital procurement.
 - No need for the contributing nations to train pilots, payload operators or maintainer.



Challenges

- Greatest challenges are regulatory vice technical.
- Frequency spectrum
- Airworthiness/licensing.
- Could the UN play a leadership role through ICAO?





Conclusion

- Indispensible element of contemporary military operations.
- Persistent situational awareness key to success in all operations regardless of their nature.
- UAVs not available to all troop contributing nations.
- The MDA service model provides a convenient means of acquiring UAV support .
- UN could consider central funding of UAV services as it has done for airlift.
- UN may be able to assist in resolving regulatory challenges.