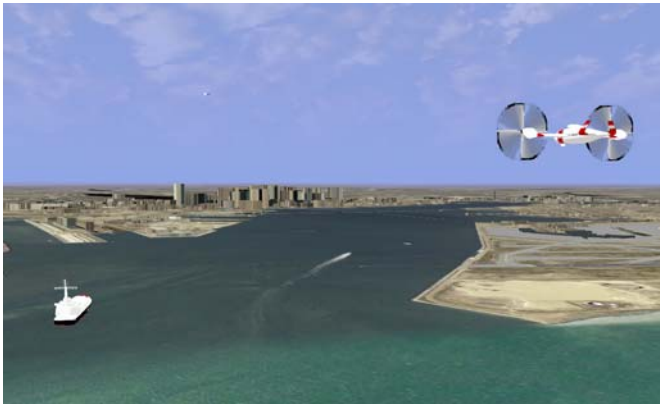




Unmanned Aircraft Systems

Unmanned Aircraft Systems (UASs) have the potential to transform air transportation in the United States. The unique characteristics of the vehicles themselves (size, speed, endurance) will enable entirely new users of the national airspace system (NAS) to emerge. However, the transformational nature of UASs extends beyond the unmanned vehicles themselves.

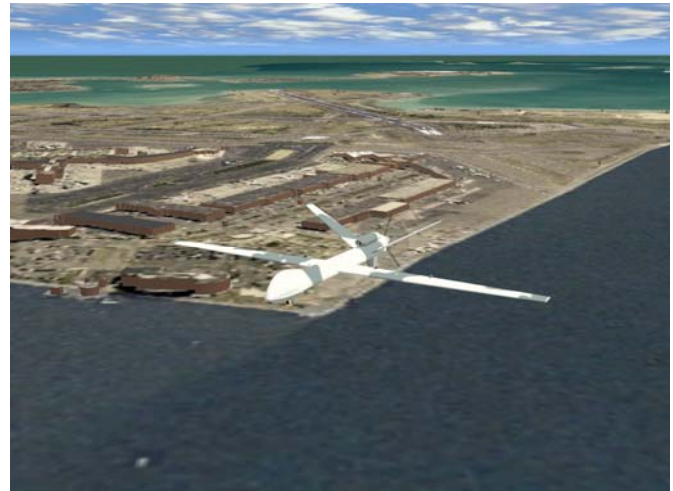


The technologies being developed to allow UASs to operate routinely in the NAS (collision avoidance systems, digital communication architectures, information sharing networks, alternative fuels, and autonomous controls) are likely to be adopted by manned systems. Thus UASs are likely to have a significant impact across all users of the future NAS.

The MITRE Corporation's Center for Advanced Aviation System Development is conducting research and analysis on many of the important issues surrounding the integration of UASs into the NAS.



To better understand the potential impact of UASs on the current and future NAS, operational scenarios for civil and commercial uses of UASs were developed, and potential impacts are being identified through modeling, simulation and visualization. Ongoing research is addressing the issues surrounding the "see and avoid" requirement for operation in the NAS. The potential role of the Traffic Alert and Collision Avoidance System (TCAS) and new technologies for small autonomous aircraft to reliably detect and avoid collisions are among the areas under investigation.



For more information, contact:

Fran Hoover
Information Management Specialist
+1.703.983.5912