USGS NATIONAL UNMANNED AIRCRAFT SYSTEMS (UAS) PROJECT OFFICE

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ABSTRACT:

The U.S. Geological Survey (USGS) National Unmanned Aircraft Systems (UAS) Project Office is leading the implementation of UAS technology to help transform the research methods and management techniques employed across the Department of the Interior (DOI). Results from the initial DOI UAS operational test and evaluation program has already shown that this technology can benefit DOI activities requiring patrol of vast expanses of public lands, monitoring of natural resources, and remote sensing at low-altitude in rugged terrain. In addition to supporting safer missions over risky or rough areas, operation of UAS has also proven to be much more cost effective than manned missions. In other words, UAS has already shown promise for providing DOI with the ability to obtain better Science, with greater Safety and Savings. Small UAS technology is already being made available to monitor environmental conditions, analyze the impacts of climate change, respond to natural hazards, understand landscape change rates, recognize the consequences and benefits of land and climate change, conduct wildlife inventories and support related land management missions. In fact since 2011 the USGS National UAS Project Office, in coordination with other Federal agencies, has successfully completed over 20 missions. The USGS is also teaming with all of the Department of the Interior agencies, academia, state and local agencies in conjunction with the Federal Aviation Administration (FAA) and the Department of the Interior Office of Aviation Services (OAS) to lead the safe, cost-effective and leading-edge adoption of UAS technology into the scientific research and operational functions of the Department of the Interior.