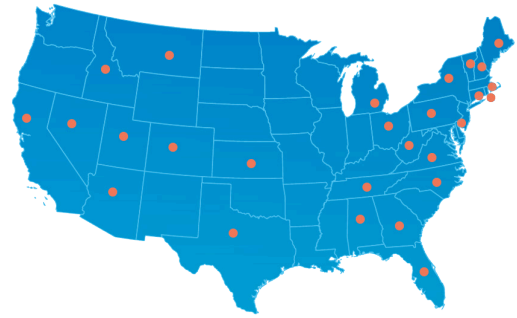




ARE Corporation's UAS Services division (dba AirShark) operates nationwide, providing an end-to-end solution for clients interested in leveraging drone technology across their operations. Our team of FAA Part 107 UAS Pilots are experienced with operating in high-risk environments near high-value assets. With an array of UAS platforms and specialized sensors, as well as the expertise to process data in-house, ARE provides a full-stack solution that enables safer, cost-effective, high-quality data collection and delivery on-demand.



ENERGY | Utility, Oil & Gas, Renewables
Transmission & Distribution Asset modeling, ROW & Vegetation Management, Structure Inspections, Hydro, Wind & Solar Inspections

CIVIL | Engineering, Construction, Institutions
Digital Surface/Elevation/Terrain models, 2D and 3D Mapping & Modeling, Progress Monitoring, BIM/VDC, Volumetrics (Cut and Fill), Building Envelope Inspections

DIFFERENTIATORS

- Operations Over People (FAA Approved)
- Nighttime Operations Approved
- Rapid Response Capabilities
- Level 1 Certified Thermographers

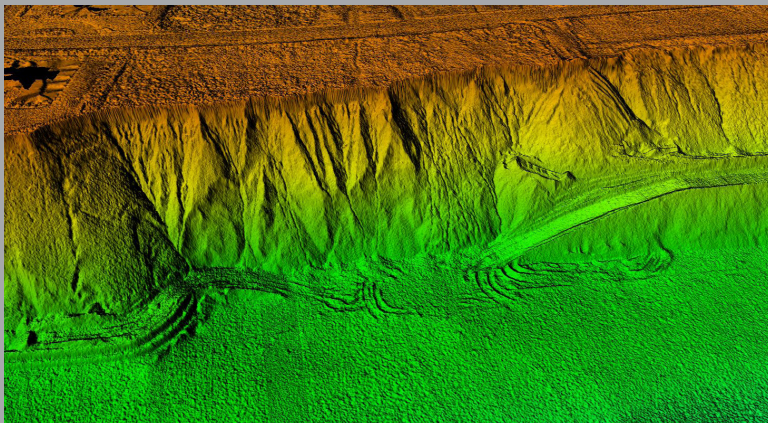
TRANSPORTATION | Rail, Highways, Marine/Ports, Aviation
Progress Monitoring and Project Documentation, Critical Infrastructure Inspections, Volumetrics (Cut & Fill), As-built's and Existing Conditions

ENVIRONMENTAL | Coastal Wetlands, Mining, Geology
Supporting Phase 1 Assessments, Coastal Erosion, Wetland Monitoring, Stormwater Monitoring, Rock Face Analysis, Mine Reclamation & Aggregate Inventories

ENVIRONMENTAL PROJECTS

AIRSHARK

AN ARE BRAND



BEACH SHORELINE MONITORING

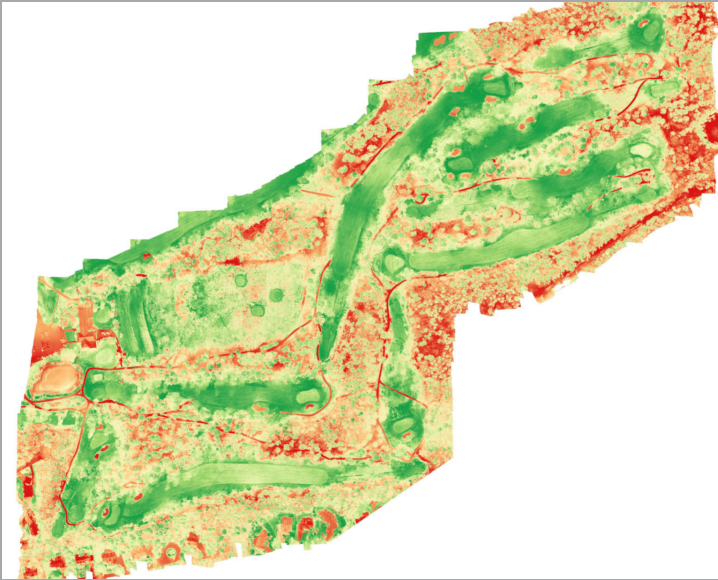
Woods Hole Group NANTUCKET, MASSACHUSETTS

Six miles of the beach, bluff, and nearby infrastructure was mapped using LiDAR and photogrammetry to monitor coastal erosion. ARE supplemented the Woods Hole Group survey team to provide accurate, high density terrain data. UAS allowed for the capture of data on steep portions of the bluff previously unobtained due to difficult and dangerous access. This data was then compared to that of traditional survey methods for validation.

DELIVERABLES

- LiDAR Point Cloud
- Digital Surface Model
- Digital Elevation Model
- Orthomosaic
- 2-FT Contour Map

Coastal Monitoring



GOLF COURSE TURF HEALTH ANALYSIS

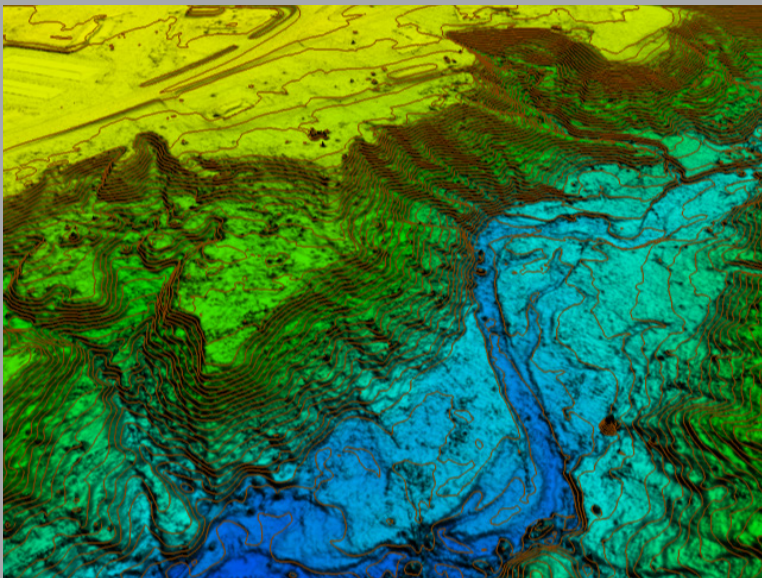
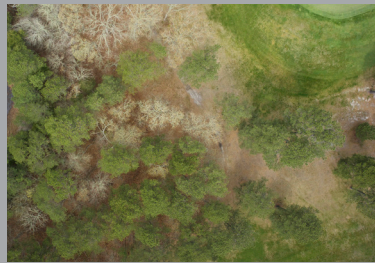
Town of Dennis, Massachusetts *DENNIS, MASSACHUSETTS*

ARE captured baseline information of an 18-hole golf course to assist the client with creating a irrigation budget and facilitating the implementation of an organic fertilizer program. ARE's UAS team scanned 175 acres capturing both RGB and NDVI images to create up-to-date maps which could be referenced and compared by the client. The use of ARE's multispectral sensor allowed the client to gage the health of the various types of vegetation and prioritize areas of higher concern on the property.

DELIVERABLES

- High Resolution RGB Orthomosaic
- NDVI Orthomosaic

ASSET MANAGEMENT



GEORGIA WATERSHED ANALYSIS

Stone Environmental *GEORGIA, VERMONT*

ARE's LiDAR team captured high density point cloud data of a heavily vegetated, problematic gully area near the center of Georgia, VT. A classified LiDAR point cloud, Digital Elevation Model, 2-ft Contours, and High-Resolution Orthomosaic were used for watershed analysis. This allowed for overall stormwater planning, evaluating upland green infrastructure retrofits, and designing future stabilization measures for the gully.

DELIVERABLES

- Classified LiDAR Point Cloud
- Digital Elevation Model
- 2-FT Contour Map
- High Resolution Orthomosaic

SITE PLANNING

