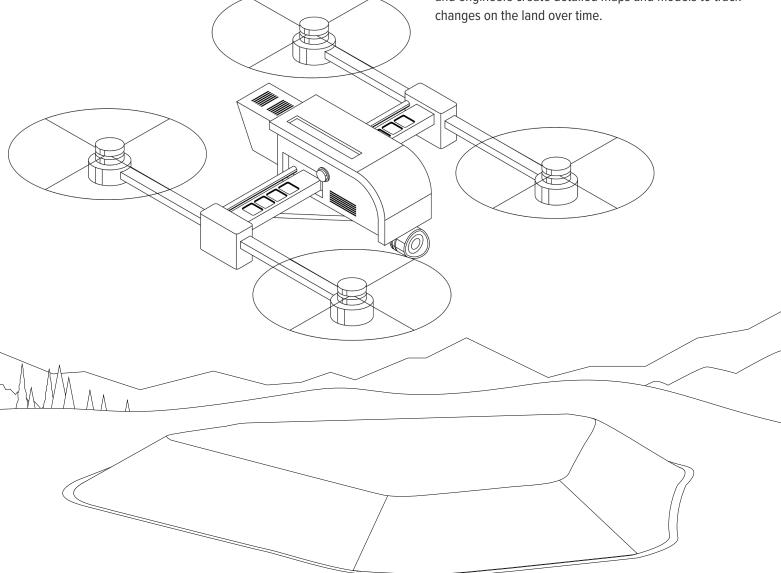




While some drones are flown for fun, these drones are on the job, flying an important science mission. Drones are small aircraft that don't carry passengers, but can be used to gather information. The Office of Legacy Management uses drones to capture images from an elevated view with cameras and take measurements with light detection and ranging (lidar) equipment. This information helps scientists and engineers create detailed maps and models to track changes on the land over time



**Age Level:** 5-11 (Preschool-Elementary).

**Key Definitions:** Aircraft, Drone, Disposal Cell, Image, Map, Pilot, Lidar, Safety, Aerial Survey, and Flight Plan.

**Objective:** To learn about drones and their lidar mapping capabilities for aerial surveys.



## **WORD SEARCH**

J	Р	Υ	F	D	R	0	Ν	Е	M	I	Т	Z	F	V
G	Χ	Α	0	-1	U	С	S	Υ	Q	J	F	Α	L	Q
-1	Q	Е	М	S	Α	F	Е	Т	Υ	Υ	Α	Е	1	Υ
Р	L	Α	Z	Р	1	L	0	Т	V	Т	R	R	G	K
0	G	Q	Е	0	D	С	Р	Ν	В	G	С	I	Н	Υ
Е	Р	L	F	S	0	V	Р	D	Χ	W	R	Α	Т	S
М	I	J	В	Α	J	K	Q	Α	М	Ν	-1	L	Р	В
Р	S	Р	Α	L	В	U	0	J	F	Ν	Α	S	L	R
J	Υ	Χ	R	С	R	F	V	Н	В	М	Υ	U	Α	Р
F	Z	Z	I	Е	Р	W	В	В	Е	Н	K	R	Ν	R
G	V	1	I	L	W	J	V	Α	Т	С	V	V	0	S
R	Α	D	I	L	Ε	0	В	K	R	V	Α	Ε	Α	Z
С	W	М	В	U	Α	S	F	W	М	Α	J	Υ	М	Ε
L	G	М	Q	W	Р	Υ	0	0	С	G	D	Α	D	0
Н	Χ	W	Н	Т	I	V	1	F	Z	R	Χ	Υ	F	Z

Aircraft
DOE
FAA
Drone
Disposal Cell
Image
Map
Pilot
Lidar
Safety
Aerial Survey

Flight Plan

## **WORD DEFINITIONS**

**Aircraft:** An airplane, helicopter, or other machine capable of flight.

**DOE:** Letters that stand for the United States Department of Energy.

**FAA:** Letters that stand for the Federal Aviation Administration.

**Drone:** An unpiloted aircraft.

**Disposal Cell:** An engineered, or human made, structure that contains uranium mill waste.

**Image:** A picture or representation of something made by a camera or artist.

**Map:** A graphic that represents an area of land showing physical features like roads, rivers, buildings, and mountains.

**Pilot:** A person who operates the flying controls of an aircraft.

**Lidar:** Stands for Light Detection and Ranging and is a scientific tool using light from a laser to measure distance.

**Safety:** Planning and thinking ahead to stay protected from danger, risk, or injury.

**Aerial Survey:** The collection of measurements and images from the sky using an aircraft with cameras and scientific equipment like lidar.

**Flight Plan:** The approved time, location, and purpose of an aircraft's flight.