# Unidentified Aerial Phenomena

#### Team Green Members:

- Ramona Bailey
- Daryn Fackrell
- Ryan Fagen
- Jay Singh
- John Teasley

#### Introduction

Overview: For our research endeavor, we set out to investigate the correlation between UFO sightings and a diverse range of contributing factors such as Year and Shape, Light Pollution, Legality of Cannabis, Starbuck locations, and Latitude.

Why: We set out on this journey because the mystery and curiosity that surrounds UFOs and extraterrestrial life has captivated human imagination for scores and we wanted to see what more we can find out. The idea that we are not alone in this universe is simply exhilarating and thought-provoking. It would also be cool to discern if aliens need coffee before they start probing us? Furthermore, analyzing UFO sightings can pinpoint trends and patterns which will enable us to better understand the mysteries in our universe and our place in it.

#### Data Source

Sightings - NUFORC Data

Shapes - <u>NUFORC Data</u>

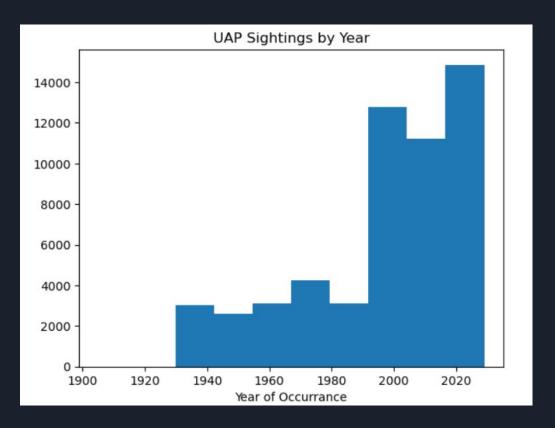
Light Pollution - Earth Data Nasa.gov

Cannabis - Cannabis Data

Starbucks - Starbucks Data

Latitude- NUFORC Data

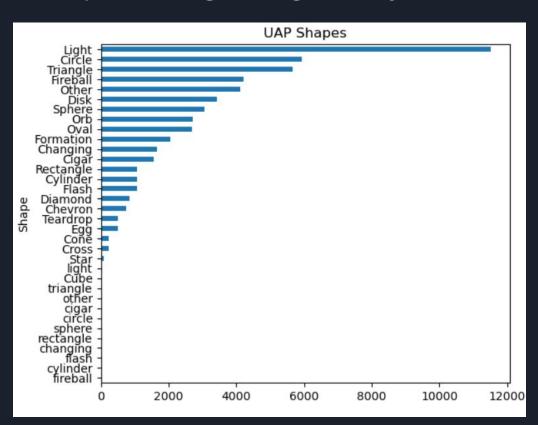
### Year of Sightings Analysis



Average year: 1996

Year with most sightings: 2020, with 2946 sightings.

# Shape of Sighting Analysis



# UFO Sightings and Light Pollution



Even though light pollution affects visibility in the sky and reduces the number of sightings, it does not seem to have as significant an impact as one might expect. Most UFO sightings are clustered around cities, where light pollution is highest.

# UFO Sightings and Legality of Cannabis

State	Avg (2004-09)	Avg (2018-23)	% Increase
Colorado	29.5	35.3	19.661017
Massachusetts	26.8	35.3	31.716418
Oregon	29.8	40.5	35.90604
Washington	52.3	51	-2.48566
4 States	138.5	168.3	21.516245
All States	2462	2659	8.0016247

Data from 2010-17 was incomplete. All four states listed legalized recreational marijuana during this period of time.

# UFO Sightings and Starbucks



**UFO Sightings** 



**Starbucks Locations** 

#### UFO's and Latitude

In the analysis for Latitude, the map clearly showed no visual correlation.

The analysis goal then became to find the median Lat / Lon. of the reports.

Based on all sightings reported, St Louis, MO was at the center of AUP reports.

Number of sightings documented = 69774 Lon Median = -91.130662 Lat Median = 38.616056

It's worth noting that the latitude remained fairly consistent between 33 and 38 degrees latitude when filtering for UAP shapes and timeline constraints.

# UFOs and Latitude

Webpage

# Summary of Findings

UFOs and Year/Shape: Most sightings occurred in the year 2020, with average number of sightings occurring in 1996. Most UFOs were shaped in the form of a circle, triangle or a fireball.

UFOS and Light Pollution: Despite reducing visibility in the sky, light pollution does not significantly impact UFO sightings.

UFOs and Legality of Cannabis: UFO sightings during periods of Marijuana legalization appear to be higher on average than periods without it over the same length of time in the same area of the country, but more time needs to pass and more states need to legalize the drug for us to know for sure.

UFOS and Starbucks: There is a clear correlation between Starbucks locations and UFO sightings. The number of sightings are higher in regions with Starbucks. Greater the number of Starbucks locations, greater the number of UFO sightings.

UFOs and Latitude: The latitude Median for all reported sightings was at 38.616056 degrees.

#### Limitations and Areas for Future Research

#### Limitations:

 Couldn't get hard data for the amount of light pollution in a given area.

#### Future Research:

- Weather/Temperature
- Time (day or night / morning or evening)
- Could've analysed more marijuana states (California, Nevada, Alaska, Maine)
- Population Density V.S. UFO Sightings

# Questions