

# Phase 1 Project:

—

Movie Analysis for Microsoft

# Overview

Client: Microsoft

Overarching Goal:

Three recommendations for  
Microsoft new movie department.

Sources:

- The Movie DB
  - Genres, Popularity
- The Numbers
  - Production Budget, Box Office
- IMDB
  - Directors Name's, Movie Ratings

# Summary

1.



**2. Production Budget has a smaller effect in World Gross Box Office**

## 3. Top Directors

Anthony Russo, Byron Howard,  
Chris Williams, Dean DeBlois,  
James Gunn, Peter Ramsey, Taika  
Waititi

# Outline

- Business Problem
- Data Understanding
- Methods
- Results
- Conclusion
- Next Steps

# Business Problem

What makes a successful movie?

Measure of success:

1. Popularity - What kind of movie?
2. Profit (Gross Box Office) - How much should be invest?
3. Average Ratings - Who makes the best movies?

# Data Understanding and Methods

Genre: Easy to change and multiple combinations.

- Top movies based off popularity

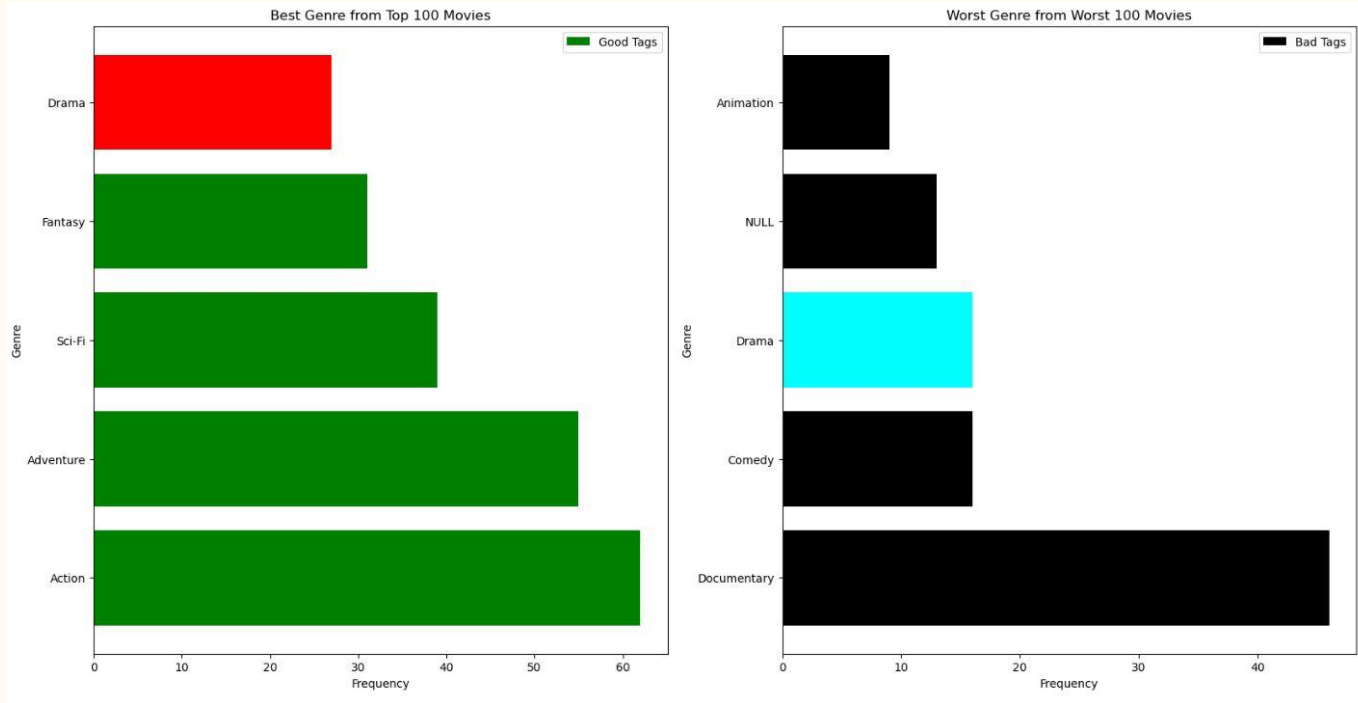
Budget vs Box Office: Relationship with money invest and the returns.

- Ratios and line of best fit

Top Directors: Most reliable person to manage the movie.

- List of the best movies and average ratings

# Results



Best Genre: Action

Worst Genre:  
Documentary

Neutral Genre:  
Drama

Fig 1. Graphs showing best and worst genres

# Does popular genre result in the most profitable movies?

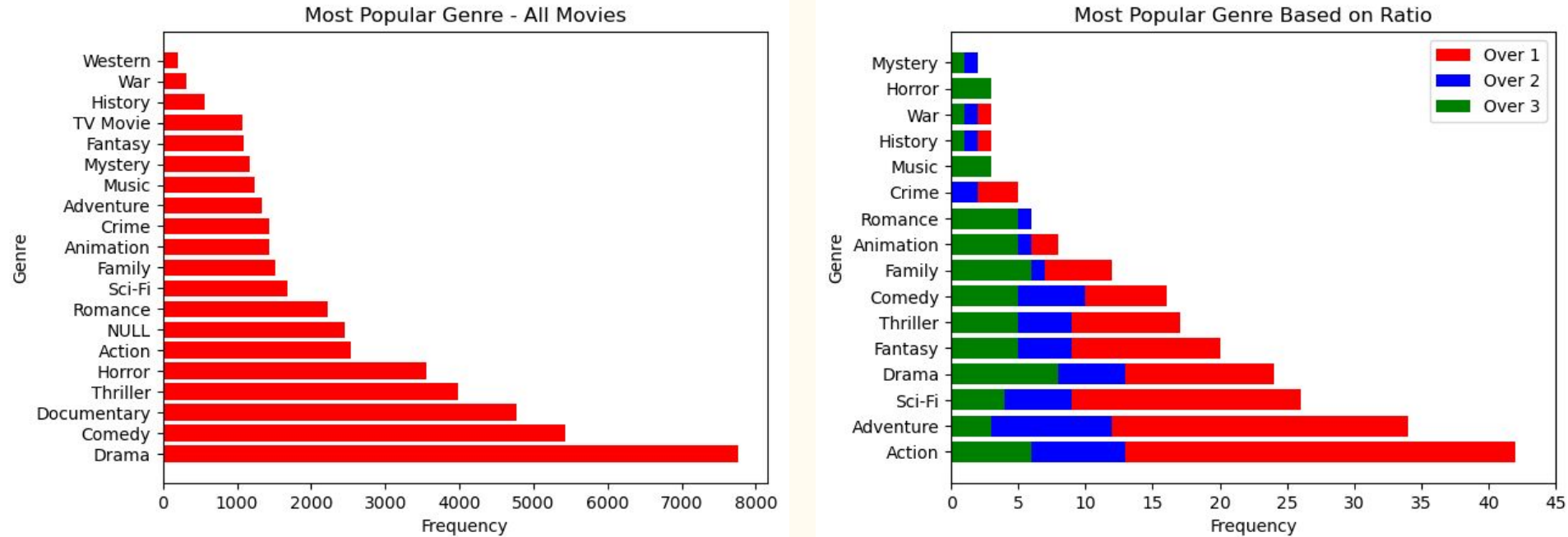
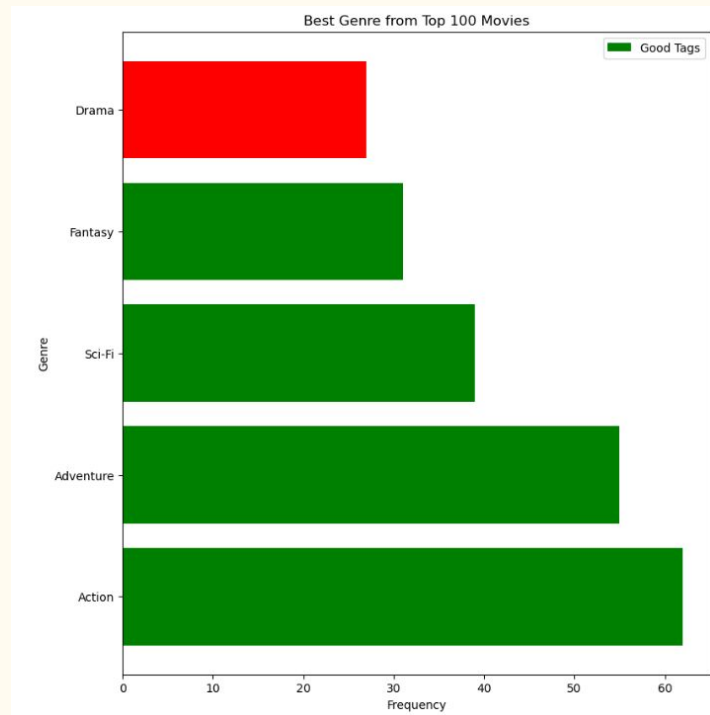
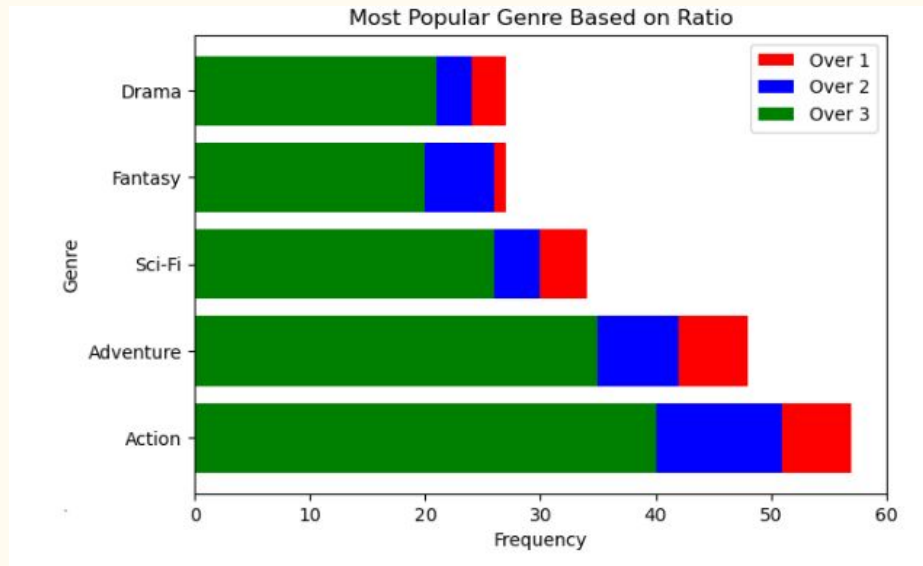


Fig 2. Graphs showing most popular genres and most popular genres when grouped by ratios



# Best Genre vs Most Popular Genre

Figure 1 and 2 are identical



# Does budget have any effect on gross profit?

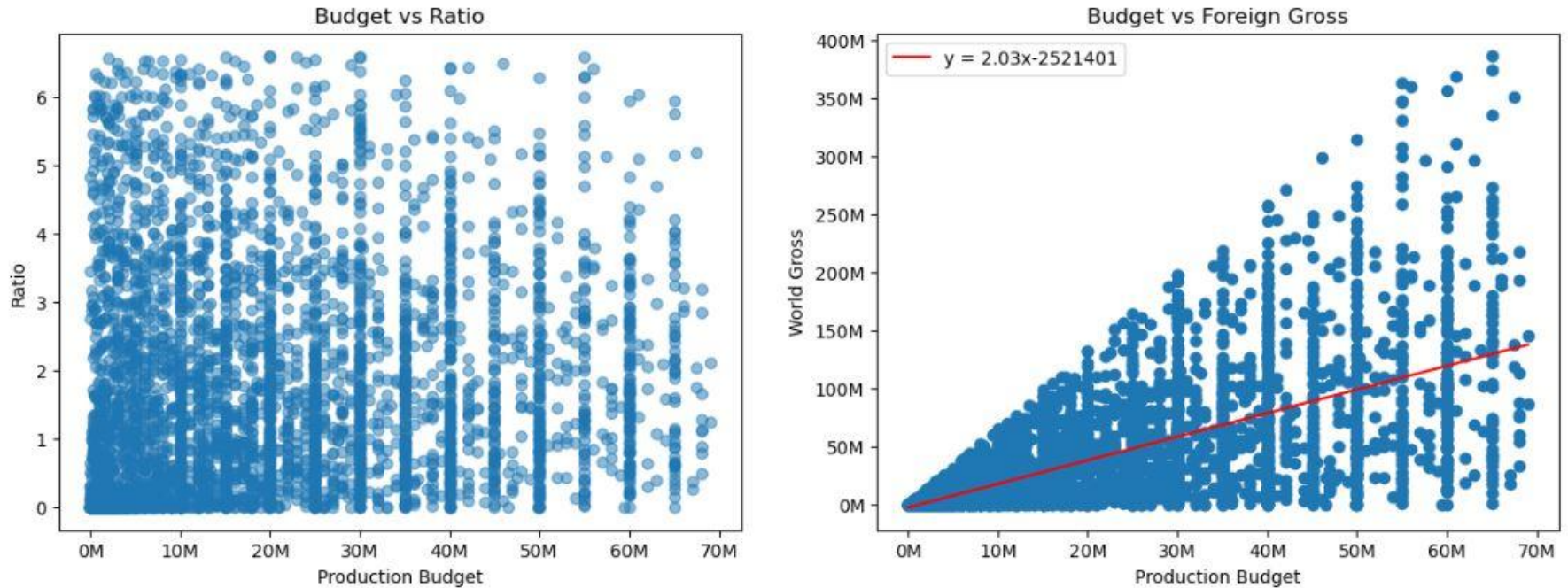


Figure 3: Two graphs plotting production budget with their ratio and their world gross from the top movies

# The Best Directors

	Movie Title	Director Name	Number of Movies	Average Movie Ratings
0	Spider-Man: Into the Spider-Verse	Peter Ramsey	6	8.5
1	Avengers: Infinity War	Anthony Russo	24	8.5
2	How to Train Your Dragon	Dean DeBlois	12	8.1
3	Guardians of the Galaxy	James Gunn	11	8.1
4	Zootopia	Byron Howard	24	8.0
5	Thor: Ragnarok	Taika Waititi	9	7.9
6	A Star Is Born	Bradley Cooper	9	7.8
7	Captain America: Civil War	Anthony Russo	12	7.8
8	Big Hero 6	Chris Williams	12	7.8
9	Guardians of the Galaxy Vol. 2	James Gunn	13	7.7

## Top 5 Directors

- Peter Ramsey
- Anthony Russo
- Dean DeBlois
- James Gunn
- Byron Howard

# Conclusion

Movie Genre: Action, Adventure, Fantasy and Sci-Fi.

Avoid - Documentary, Horror, Thriller

Production Budget: Higher budget results in slightly higher box office, 1:2 ratio.

Top 5 Directors

- Peter Ramsey
- Anthony Russo
- Dean DeBlois
- James Gunn
- Byron Howard

## Next Step?

- Other influential individuals effects? (Actors, Writers)
- Advertisement Budget?
- Different measure of success (Ratio was a bad indicator)

# Thank you

Email: [phungtommy109@gmail.com](mailto:phungtommy109@gmail.com)

Github: @Tommyphung1

Question?