Advice For Microsoft's New Movie Studio

OVERVIEW

Aim: Provide advice to Microsoft (hypothetically) on which types of movies to create for their new movie studio.

Methodology: Using exploratory data analysis, I tried to understand what are some important factors for being successful in the industry.

Summary of Results:

- Best movie genres for profit and ratings seem to be a mix in of adventure and drama.
- Best people to work with for a new movie to get the highest profit are Michael
 Crichton, Joe Robert Cole and Rafe Spall.
- Interestingly, IMDB and TMDB ratings offer different genres and people.

Data

- Data Source: Box Office Mojo, IMDB, Rotten Tomatoes, and TheMovieDB.org. (The data is provided by Flatiron school and collected from the respective websites.)
- Data is about: movie titles, genres, directors, actors, profits, release year etc..
- Data size: 16,184 movies (when merged on common columns)
- Target variables: ratings and profit
- Some columns are dropped from analysis.
- Profit is calculated using worldwide gross and production budget.
- NaN values are omitted (not filled).

Summary of Results

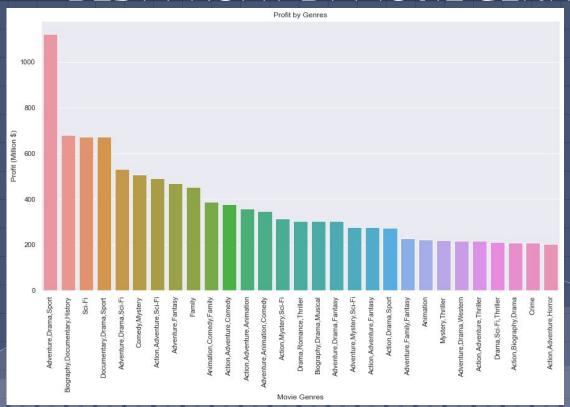
- Best movie genres for the highest profit:
 - Adventure, Drama, Sport
 - Biography, Documentary, History
 - 3. Sci-Fi
- Best people to work with for the highest profit:
 - 1. Michael Crichton
 - 2. Joe Robert Cole
 - 3. Rafe Spall
- Best movie genres by average votes on TMDB:
 - Documentary, History
 - 2. Mystery, Thriller
 - 3. Biography, Drama, Musical
- Best movie genres by ratings on IMDB:
 - 1. Adventure
 - 2. Action, Sport
 - Crime, Documentary

Analysis





BEST PROFIT BY MOVIE GENRE



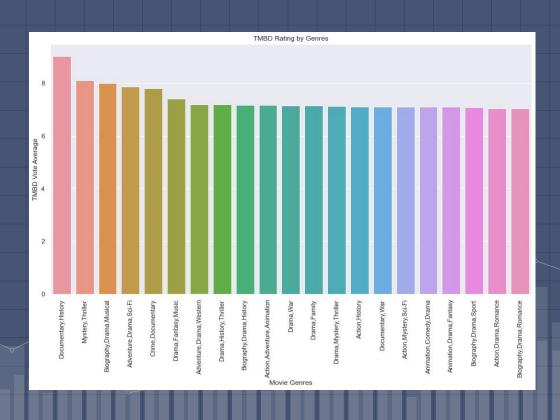
- 1. Adventure, Drama, Sport
- 2. Biography, Documentary, History
- 3. Sci-Fi
- 4. Documentary, Drama, Sport
- 5. Adventure, Drama, Sci-Fi
- 6. Comedy, Mystery
- 7. Action, Adventure, Sci-Fi
- 8. Adventure, Fantasy
- 9. Family
- 10. Animation, Comedy, Family

BEST IMDB RATINGS BY MOVIE GENRE



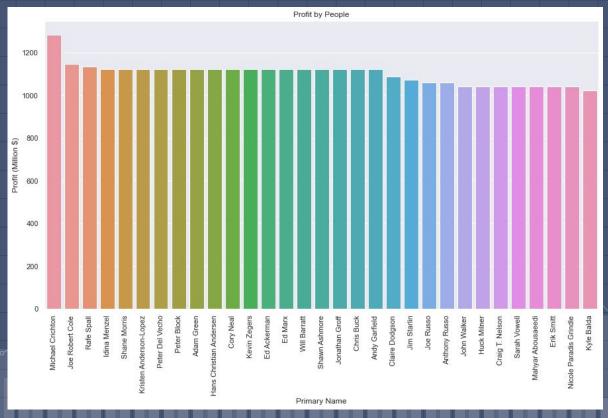
- 1. Adventure
- 2. Action, Sport
- 3. Crime, Documentary
- 4. Adventure, Drama, Sci-Fi
- 5. Mystery, Thriller
- 6. Sport
- 7. Adventure, Drama, Mystery
- 8. Comedy, Musical
- 9. Adventure, Drama, Western
- 10. Biography, Drama, Musical

BEST TMDB RATINGS BY MOVIE GENRE



- 1. Documentary, History
- 2. Mystery, Thriller
- 3. Biography, Drama, Musical
- 4. Adventure, Drama, Sci-Fi
- 5. Crime, Documentary
- 6. Drama, Fantasy, Music
- 7. Adventure, Drama, Western
- 8. Drama, History, Thriller
- 9. Biography, Drama, History
- 10. Action, Adventure, Animation

BEST PROFIT BY PEOPLE



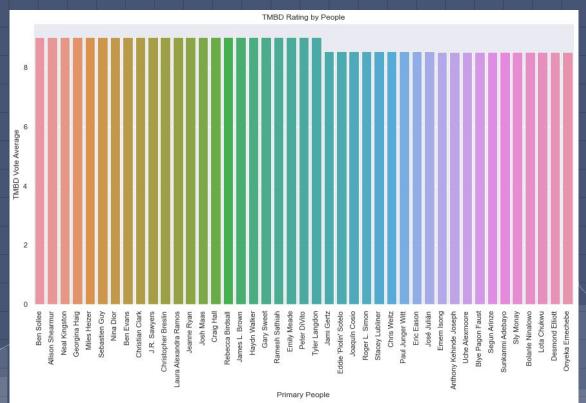
- 1. Michael Crichton
- 2. Joe Robert Cole
- 3. Rafe Spall
- 4. Idina Menzel
- 5. Shane Morris
- 6. Kristen Anderson-Lopez
- 7. Peter Del Vecho
- 8. Peter Block
- 9. Adam Green
- 10. Hans Christian Andersen

BEST IMDB RATINGS BY PEOPLE



- 1. Tara Fitzgerald
- 2. Andrew Swarbrick
- 3. Richard Heap
- 4. Mark Addy
- 5. Scott Nicol
- 6. Lee Boardman
- 7. Mario Roberto
- 8. Mark Thomas
- 9. Laura Perez
- 10. Phil Wood

BEST TMDB RATINGS BY MOVIE GENRE



- 1. Ben Sollee
- 2. Allison Shearmur
- 3. Neal Kingston
- 4. Georgina Haig
- 5. Miles Heizer
- 6. Sebastien Guy
- 7. Nina Dior
- 8. Ben Evans
- 9. Christian Clark
- 10. J.R. Sawyers

Conclusion

Results

- This primary analysis gives a general idea about where to start, but more analysis should be done for better understanding of the industry.

Improvements

- Other factors to consider: the time of the year, the economy or any crisis going on, that are not included in analysis.
- Focus on directors, or actors in specific instead of people in general.
- Separate genre categories and do a more comprehensive analysis.