

Practice Exercise: EDA With Python

The following is a post-class exercise for practicing exploratory data analysis using Python.

Note: This is neither a graded assessment nor has any time restraints for completion.

Case Study Number & Title	3. Analyzing the IMDB movie data for drawing inferences on the movie ratings
Background Information	IMDB dataset contains the top rated movies and television shows with information on the cast and crew, and the gross earnings from the box office or runtime on broadcasting channels.
Problem Statement/ Business objectives	Analyze the data to identify top grossing movies and shows, and explore using Python to extract relevant insights.
Data, Information for case analysis	<p>Data is provided as a csv file. Below is the source and attribute information.</p> <p>Source link: https://www.kaggle.com/datasets/harshitshankhdhar/imdb-dataset-of-top-1000-movies-and-tv-shows</p> <p><u>Data Description</u></p> <p>Series_Title: Name of the movie Released_Year: Year of movie release Certificate: Certificate earned by the movie Runtime: Total runtime of the movie Genre: Genre of the movie IMDB_Rating: Rating of the movie as on IMDB website Overview: Summary of the movie Meta_score: Score earned by the movie Director: Name of the Director Star1, Star2, Star3, Star4: Name of the Stars Noofvotes: Total number of votes Gross: Gross collection earned by the movie</p>
Questions	<ol style="list-style-type: none"> How many movies directed by Hayao Miyazaki the meta score of which lies between 85 and 100 have occupied this list? What is the average rating of movies that have been PG-13 certified?

	<p>3. Create a pivot table citing the median scores of A certified movies released post 2015.</p> <p>4. Determine the least rating given for Francis Ford Coppola movies.</p> <p>5. How many movies with actors Al Pacino and Robert De Niro as the first and second leads are present in the data?</p>
Solution	A sample solution also provided with the dataset
Deliverables for Solution and Rubric	Non-graded assessment
Key Takeaways/Results	Exploring and analyzing data using Python and deriving meaningful insights.