
Welcome to Bigglies
Watchlist Tool
1. Add movie
2. Edit movie
3. Remove movie
4. Print your watchlist
5. Sort by genre
6. Sort by release date
7. Mark movie as watched
8. Select a random movie from your watchlist (under construction)
9. Quit
Enter your choice:

Importing modules & adding movies.

- The first three lines of code import Python modules necessary to run this script: csv, json, and random.
- The `add_movie()` function takes an argument `watch_list` and then prompts the user to enter movie details after that it adds the movie details to the `watch_list.json` and checks if the movie is part of a series and if so, saves the series name and episode number as well.

```python
import csv
import json
import random

def add_movie(watch_list):
    movie = input("Enter the movie name: ")
    genre = input("Enter the genre of the movie: ")
    release_date = input("Enter the release date of the movie: ")
    series = input("Is this movie part of a series? (Y/N) ").upper()

    if series == "Y":
        series_name = input("Enter the series name: ")
        episode_number = input("Enter the episode number: ")

        watch_list[movie] = {"genre": genre, "release_date": release_date, "series_name": series_name, "episode_number": episode_numb
    else:
        watch_list[movie] = {"genre": genre, "release_date": release_date}

    print(f"{movie} has been added to your watchlist.")
```

Editing and Removing movies from the watchlist

- The `edit_movie()` function takes an argument `watch_list` and prompts the user to enter movie name to edit and then edits movie details if the specified movie is found in the `watch_list`.
- The `remove_movie()` function takes an argument `watch_list` and prompts the user to enter movie name to remove then will remove the movie from the `watch_list` if the specified movie is found.

```
21  def edit_movie(watch_list):
22      movie = input("Enter the movie you want to edit: ")
23      if movie in watch_list:
24          genre = input(f"Enter the new genre for {movie}: ")
25          release_date = input(f"Enter the new release date for {movie}: ")
26          series = input(f"Is {movie} part of a series? (Y/N) ").upper()
27          if series == "Y":
28              series_name = input("Enter the new series name: ")
29              episode_number = input("Enter the new episode number: ")
30
31              watch_list[movie] = {"genre": genre, "release_date": release_date, "series_name": series_name, "episode_number": episode_number}
32          else:
33              watch_list[movie] = {"genre": genre, "release_date": release_date}
34
35          print(f"{movie} has been edited.")
36      else:
37          print(f"{movie} not found on watchlist.")
38
39  def remove_movie(watch_list):
40      movie = input("Enter the movie you want to remove: ")
41      if movie in watch_list:
42          watch_list.pop(movie)
43          print(f"{movie} has been removed from your watchlist.")
44      else:
45          print(f"{movie} not found on watchlist.")
```

Printing the watchlist

- The `print_watchlist()` function takes an argument `watch_list` and prints the current watchlist if it's not empty.

```
47  def print_watchlist(watch_list):
48      if watch_list:
49          print("Here's your current watchlist:")
50          for movie, details in watch_list.items():
51              print(f"{movie} ({details['genre']}, {details['release_date']})")
52      else:
53          print("Your watchlist is empty.")
```

Sorting Genre and Release Date

- The `sort_by_genre()` function takes an argument `watch_list` and prompts the user to enter genre then prints a list of movies from the `watch_list` that match that genre.
- The `sort_by_release_date()` function takes an argument `watch_list` and sorts the movies in the `watch_list` by their release dates in ascending order then prints the sorted list.

```
55  def sort_by_genre(watch_list):
56      genre = input("Enter the genre you want to view: ")
57      genre_list = []
58      for movie, details in watch_list.items():
59          if details["genre"].lower() == genre.lower():
60              genre_list.append(movie)
61      if genre_list:
62          print(f"Here are your movies with genre '{genre}':")
63          for movie in genre_list:
64              print(movie)
65      else:
66          print(f"No movies found with genre '{genre}' in your watchlist.")
67
68  def sort_by_release_date(watch_list):
69      release_date_list = []
70      for movie, details in watch_list.items():
71          release_date_list.append((movie, details["release_date"]))
72      release_date_list = sorted(release_date_list, key=lambda x: x[1])
73      print("Here are your movies sorted by release date:")
74      for movie in release_date_list:
75          print(f"{movie[0]} ({movie[1]})")
```

Display watchlist & Picking a random movie

- The `display_watchlist()` function reads the contents of a JSON file named "watch_list.json" and prints the movie details in a formatted table.
- The `pick_random_movie()` function reads the contents of a JSON file named "watch_list.json" and selects a random movie from the list of movies added to the file.

```
77  def display_watchlist():
78      with open("watch_list.json", "r") as f:
79          watch_list = json.load(f)
80      print("Your Watchlist:")
81      print("{:<30} {:<20} {:<10}".format("Movie Name", "Genre", "Release Date"))
82      for movie in watch_list:
83          print("{:<30} {:<20} {:<10}".format(movie["name"], movie["genre"], movie["release_date"]))
84
85  def pick_random_movie():
86      with open("watch_list.json", "r") as f:
87          watch_list = json.load(f)
88      if not watch_list:
89          print("Your Watchlist is empty.")
90      else:
91          random_movie = random.choice(watch_list)
92          print(f"Randomly selected movie: {random_movie['name']}")
93          print(f"Genre: {random_movie['genre']}")
94          print(f"Release Date: {random_movie['release_date']}")
```

The bones of the operation

- The `main()` function is the primary function that runs the watchlist tool. It calls upon previously mentioned functions according to input selected by the user.

```
96    def main():
97        with open("watch_list.json", "r") as f:
98            watch_list = json.load(f)
```

Users Input

- This section takes the input from the user about their choice.
- Based on the user's input, it calls functions to add, edit, or remove a movie from the watchlist, print the current watchlist, sort the movies by genre or release date, mark a movie as watched, select a random movie, quit the application and save the watchlist data.
- If an invalid choice is entered, it prints an error message and prompts the user to choose again.

```
124         choice = input("Enter your choice: ")
125
126         if choice == "1":
127             add_movie(watch_list)
128         elif choice == "2":
129             edit_movie(watch_list)
130         elif choice == "3":
131             remove_movie(watch_list)
132         elif choice == "4":
133             print_watchlist(watch_list)
134         elif choice == "5":
135             sort_by_genre(watch_list)
136         elif choice == "6":
137             sort_by_release_date(watch_list)
138         elif choice == "7":
139             watched_movie = input("Enter the movie you've watched: ")
140             if watched_movie in watch_list:
141                 with open("watched_movies.txt", "a") as f:
142                     f.write(watched_movie + "\n")
143                     print(f"{watched_movie} has been added to your watched list.")
144                 watch_list.pop(watched_movie)
145             else:
146                 print(f"{watched_movie} not found on watchlist.")
147         elif choice == "8":
148             pick_random_movie()
149         elif choice == "9":
150             with open("watch_list.json", "w") as f:
151                 json.dump(watch_list, f)
152             print("Thanks for using Blade's Watchlist Tool. Goodbye!")
153             break
154         else:
155             print("Invalid choice. Try again.")
```

Summary

- That is an overview of most of the code that goes into this python application. All sections are working bar the random movie as I kept having various random issues and ran out of time to fix it. Thank you for reviewing my program!