In [1]:

```
# Create the years and durations lists
years = [2011,2012,2013,2014,2015,2016,2017,2018,2019,2020]
durations = [103,101,99,100,100,95,95,96,93,90]

# Create a dictionary with the two lists
movie_dict = {"years":years,"durations":durations}

# Print the dictionary
movie_dict
```

Out[1]:

```
{'years': [2011, 2012, 2013, 2014, 2015, 2016, 2017, 2018, 2019, 2020],
 'durations': [103, 101, 99, 100, 100, 95, 95, 96, 93, 90]}
```

In [2]:

```
# Import pandas under its usual alias
import pandas as pd

# Create a DataFrame from the dictionary
durations_df = pd.DataFrame(movie_dict)

# Print the DataFrame
print(durations_df) # or just durations_df
```

```
   years  durations
0   2011        103
1   2012        101
2   2013         99
3   2014        100
4   2015        100
5   2016         95
6   2017         95
7   2018         96
8   2019         93
9   2020         90
```

In [3]:

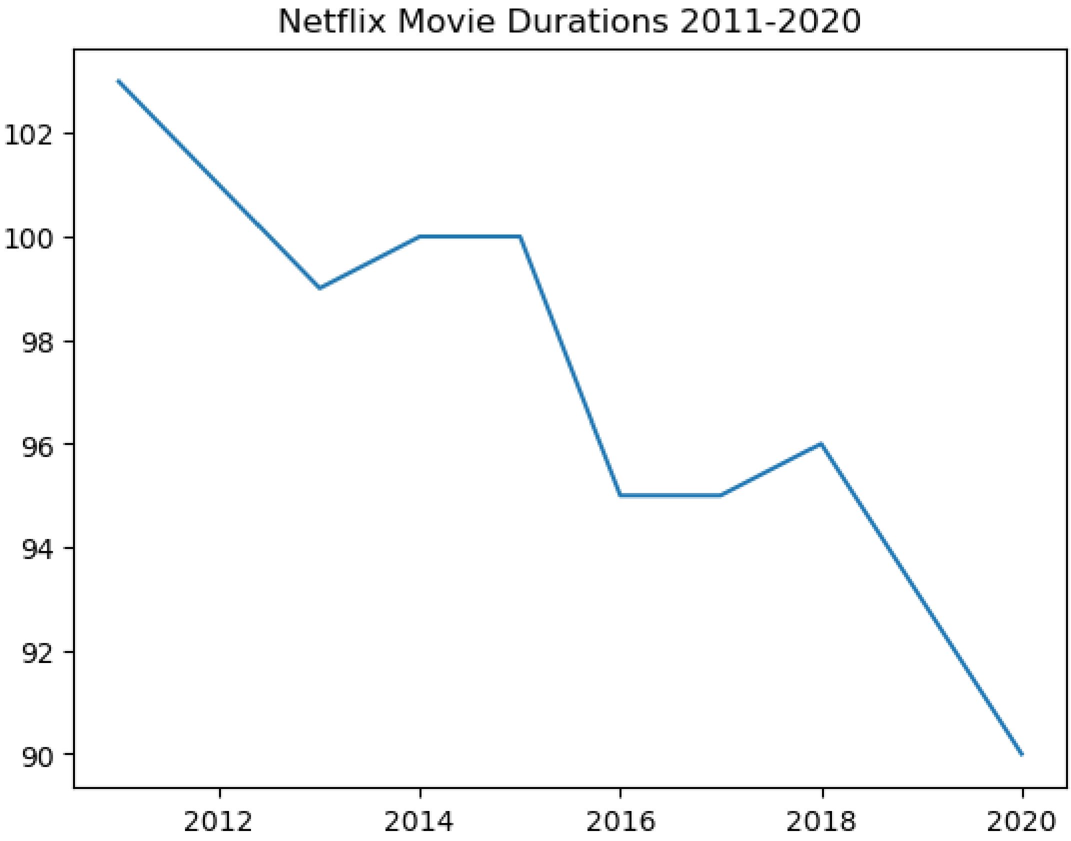
```
# Import matplotlib.pyplot under its usual alias and create a figure
import matplotlib.pyplot as plt
fig = plt.figure()

# Draw a line plot of release_years and durations
plt.plot(durations_df['years'], durations_df['durations'])

# Create a title
plt.title('Netflix Movie Durations 2011-2020')
```

Out[3]:

```
Text(0.5, 1.0, 'Netflix Movie Durations 2011-2020')
```



In [4]:
```
# Read in the CSV as a DataFrame
netflix_df = pd.read_csv(r'netflix_data.csv')

# Print the first five rows of the DataFrame
netflix_df.head() # or netflix_df[:5] or netflix_df.iloc[:5,]
```

Out[4]:

	show_id	type	title	director	cast	country	date_added	release_year	durati
0	s1	TV Show	3%	NaN	João Miguel, Bianca Comparato, Michel Gomes, R...	Brazil	August 14, 2020	2020	
1	s2	Movie	7:19	Jorge Michel Grau	Demián Bichir, Héctor Bonilla, Oscar Serrano, ...	Mexico	December 23, 2016	2016	9
2	s3	Movie	23:59	Gilbert Chan	Tedd Chan, Stella Chung, Henley Hii, Lawrence ...	Singapore	December 20, 2018	2011	
3	s4	Movie	9	Shane Acker	Elijah Wood, John C. Reilly, Jennifer Connelly...	United States	November 16, 2017	2009	8
4	s5	Movie	21	Robert Luketic	Jim Sturgess, Kevin Spacey, Kate Bosworth, Aar...	United States	January 1, 2020	2008	1

In [5]:

```
# Subset the DataFrame for type "Movie"
netflix_df_movies_only = netflix_df.query('type == "Movie"')

# Select only the columns of interest
netflix_movies_col_subset = netflix_df_movies_only[['title','country','genre

# Print the first five rows of the new DataFrame
netflix_movies_col_subset.head()
```

Out[5]:

	title	country	genre	release_year	duration
1	7:19	Mexico	Dramas	2016	93
2	23:59	Singapore	Horror Movies	2011	78
3	9	United States	Action	2009	80
4	21	United States	Dramas	2008	123
6	122	Egypt	Horror Movies	2019	95

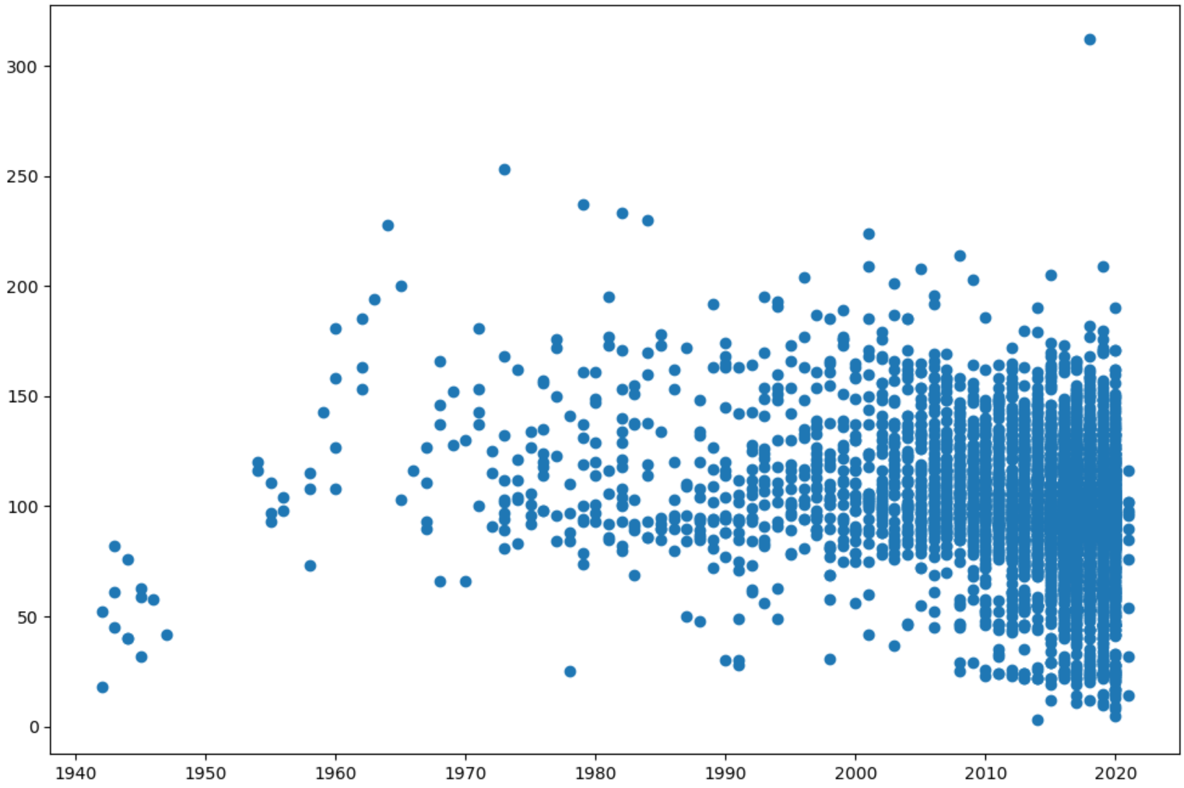
In [6]:

```
# Create a figure and increase the figure size
fig = plt.figure(figsize=(12,8))

# Create a scatter plot of duration versus year
plt.scatter(netflix_movies_col_subset.release_year, netflix_movies_col_subse
# Create a title
plt.title("Movie Duration by Year of Release")

# Show the plot
plt.show()
```

Movie Duration by Year of Release



In [7]:

```
# Filter for durations shorter than 60 minutes
short_movies = netflix_movies_col_subset[netflix_movies_col_subset['duration
#short_movies = netflix_movies_col_subset.query('duration < 60')

# Print the first 10 rows of short_movies
short_movies.head(10)
```

Out[7]:

	title	country	genre	release_year	duration
35	#Rucker50	United States	Documentaries	2016	56
55	100 Things to do Before High School	United States	Uncategorized	2014	44
67	13TH: A Conversation with Oprah Winfrey & Ava ...	NaN	Uncategorized	2017	37
101	3 Seconds Divorce	Canada	Documentaries	2018	53
146	A 3 Minute Hug	Mexico	Documentaries	2019	28
162	A Christmas Special: Miraculous: Tales of Lady...	France	Uncategorized	2016	22
171	A Family Reunion Christmas	United States	Uncategorized	2019	29
177	A Go! Go! Cory Carson Christmas	United States	Children	2020	22
178	A Go! Go! Cory Carson Halloween	NaN	Children	2020	22
179	A Go! Go! Cory Carson Summer Camp	NaN	Children	2020	21

In [8]:

```python
# Define an empty list
colors = []

# Iterate over rows of netflix_movies_col_subset
for lab, row in netflix_movies_col_subset.iterrows() :
    if row['genre'] == "Children" :
        colors.append("red")
    elif row['genre'] == "Documentaries" :
        colors.append("blue")
    elif row['genre'] == "Stand-Up" :
        colors.append("green")
    else:
        colors.append("black")

# Inspect the first 10 values in your list
colors[:10]
```

Out[8]:

```
['black',
 'black',
 'black',
 'black',
 'black',
 'black',
 'black',
 'black',
 'black',
 'blue']
```

In [9]:

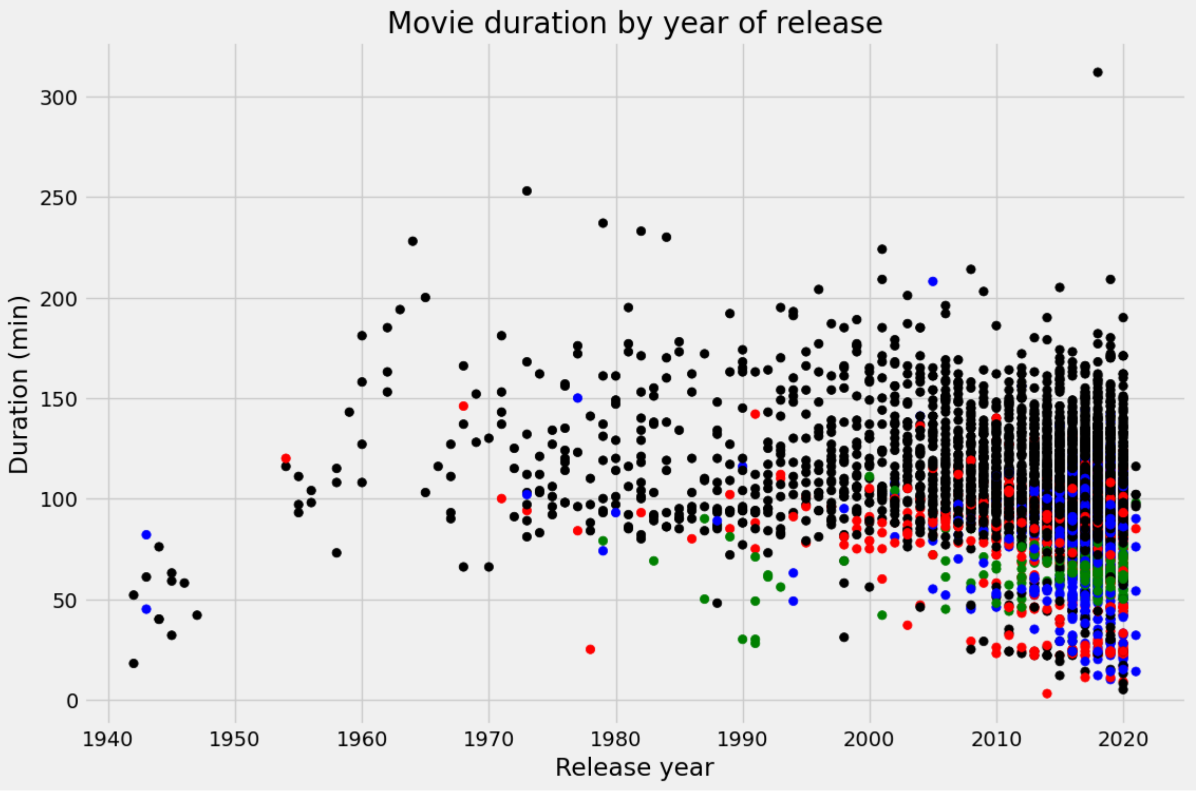
```python
# Set the figure style and initalize a new figure
plt.style.use('fivethirtyeight')
fig = plt.figure(figsize=(12,8))

# Create a scatter plot of duration versus release_year
plt.scatter(netflix_movies_col_subset.release_year, netflix_movies_col_subse

# Create a title and axis labels
plt.title("Movie duration by year of release")
plt.xlabel("Release year")
plt.ylabel("Duration (min)")
```

Out[9]:

```
Text(0, 0.5, 'Duration (min)')
```



In [ ]:

In [ ]: