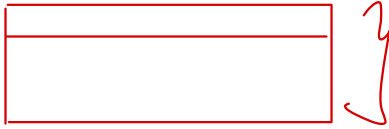


Data Cleaning → how to make the dataset  
ready to be  
consumed.

→ Analysis

Format

txt → CSV



Count, groupby

⇓ right

# Challenges

① Missing values

② ~~Date format~~

③ ~~Comma separated values (Nested values)~~

④ Duration

Title	Director	Cost	Director	Country
ABC	D <sub>1</sub> , D <sub>2</sub>	C <sub>1</sub> , C <sub>2</sub> , C <sub>3</sub>	G <sub>1</sub> , G <sub>2</sub>	Cont1, Cont2
XYZ	D <sub>2</sub> , D <sub>3</sub>	C <sub>2</sub> , C <sub>5</sub>	G <sub>1</sub> , G <sub>2</sub>	Cont1, Cont2

Nested

Step 1 split ('-', '')

	Costo	Cont1	Cont2
ABC	C <sub>1</sub>	C <sub>2</sub>	C <sub>3</sub>

Sort on the basis of movies directed by each director.  
→ Director with most number of movies

df\_final.groupby("Director")["Title"].unique().sort\_values  
(ascending=False)

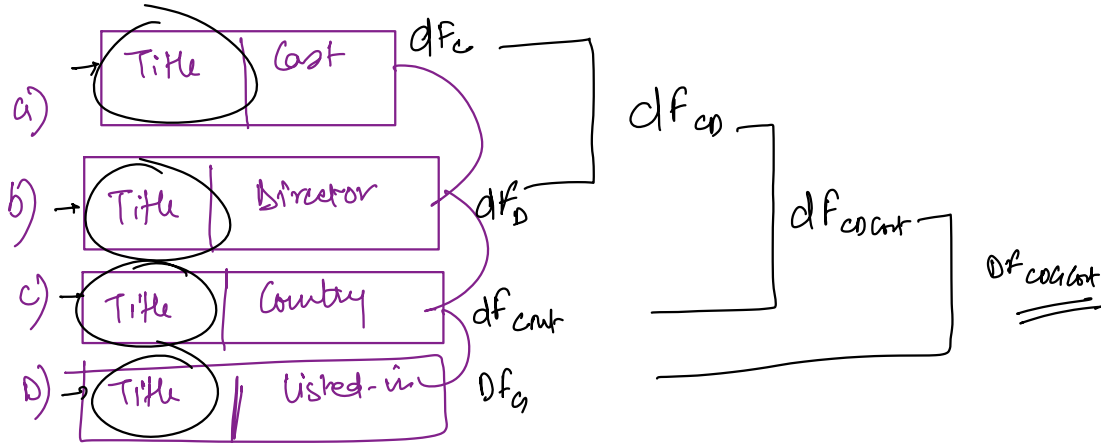
Step 2 Stack (Col into rows)

ABC C<sub>1</sub>  
ABC C<sub>2</sub>  
ABC C<sub>3</sub>

Title	Director	Cost
ABC	D <sub>1</sub>	C <sub>1</sub>
ABC	D <sub>1</sub>	C <sub>2</sub>
ABC	D <sub>2</sub>	C <sub>1</sub>
ABC	D <sub>2</sub>	C <sub>2</sub>
ABC	D <sub>1</sub>	C <sub>3</sub>
ABC	D <sub>2</sub>	C <sub>3</sub>

Unnested

Step 3



Step 4

Merge → left, winner

Step 5 Merge it back with remaining lots of the original DF using  
"T.H.U"

df\_final

- Most popular actor & director pair.
- Genre with most number of movies.
- \_\_\_\_\_
- \_\_\_\_\_
- \_\_\_\_\_

① { Date\_added } → datetime → Extract month, year, day,  
day of week  
↳ pd.to\_datetime( — ) →

What insights you can find if you fix this?

↑ month when most movies were added  
 year  
 ↓ → day of week →

Duration

Title	Type	Duration	Duration [0]
ABC	Movie	90 min	90
XZ	TV	2 season	2
MNO	Movie	110 minutes	110

Split ('')[0]

Average runtime of movies & tv shows  
 Median runtime of min seasons

df.groupby('Type')['Duration'].median()

so we can say what is the most popular format in each country or genre..do people watch longer movies in some countries?

## Missing values

(\*) Mode → most occurring cat

- ① Unknown ✓
- ② Delete ✓
- ③ Mode ✓

DFA

Actor	Director	Mode (Director)
A <sub>1</sub>	D <sub>1</sub>	D <sub>1</sub>
A <sub>1</sub>	D <sub>1</sub>	D <sub>1</sub>
A <sub>1</sub>	D <sub>1</sub>	D <sub>1</sub>
A <sub>1</sub>		D <sub>1</sub>
A <sub>1</sub>	D <sub>3</sub>	D <sub>1</sub>
A <sub>2</sub>	D <sub>5</sub>	D <sub>5</sub>
A <sub>2</sub>	D <sub>5</sub>	D <sub>5</sub>
A <sub>2</sub>	D <sub>5</sub>	D <sub>5</sub>
A <sub>1</sub>	D <sub>1</sub>	D <sub>1</sub>
A <sub>1</sub>	D <sub>1</sub>	D <sub>1</sub>
A <sub>2</sub>	D <sub>4</sub>	D <sub>5</sub>
A <sub>2</sub>		D <sub>5</sub>

Mode (Director) → D<sub>1</sub>

By Method → you are right }

"Most Appropriate" interpretation

How to do this

Reference column I will see → accordingly  
I will create mode &  
then inputs

{ df.groupby("Actor") [Director].mode() }

Actor	Mode(Director)
A <sub>1</sub>	D <sub>1</sub>
A <sub>2</sub>	D <sub>5</sub>

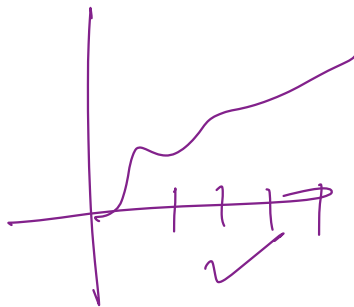
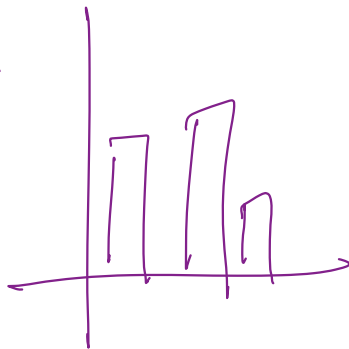
DFA

Soln

Merge DFA & DFA on the basis of Actor

Analysis

→



Insights