```
Python 3.8.5 (default, Sep  3 2020, 21:29:08) [MSC v.1916 64 bit (AMD64)]
Type "copyright", "credits" or "license" for more information.

IPython 7.19.0 -- An enhanced Interactive Python.

In [1]:          'C:/Users/lunas/Desktop/Recommend.Systems Research/Midterm/starter --
Mid-Term project/starter code and data/recommendations.py'      ='C:/Users/lunas/
Desktop/Recommend.Systems Research/Midterm/starter -- Mid-Term project/starter code and
data'

path: C:\Users\lunas\Desktop\Recommend.Systems Research\Midterm\starter -- Mid-Term
project\starter code and data


R(ead) critics data from file?,
RML(ead ml100K data)?,
P(rint) the U-I matrix?,
V(alidate) the dictionary?,
S(tats) print?,
D(istance) critics data?,
PC(earson Correlation) critics data?
U(ser-based CF Recommendations)?
LCV(eave one out cross-validation)?
LCVSIM(eave one out cross-validation)?
Sim(ilarity matrix) calc?
Simu(user-user sim matrix)?
I(tem-based CF Recommendations)?
rml

Reading "u.data" dictionary from file
Number of users: 943
List of users [0:10]: ['196', '186', '22', '244', '166', '298', '115', '253', '305',
'6']


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I(tem-based CF Recommendations)?
sim


Enter similarity significance weighting n/(sim_weighting): 0 [None], 25, 50
50
similarity weighting set to 50

Enter similarity threshold: >0, >0.3, >0.5
```

```
3
sim_threshold set to >0.3


RD(ead) distance or RP(ead) pearson or WD(rite) distance or WP(rite) pearson?
wd
6.009615384615385% complete
12.01923076923077% complete
18.028846153846153% complete
24.03846153846154% complete
30.048076923076923% complete
36.05769230769231% complete
42.06730769230769% complete
48.07692307692308% complete
54.08653846153846% complete
60.09615384615385% complete
66.10576923076923% complete
72.11538461538461% complete
78.125% complete
84.13461538461539% complete
90.14423076923077% complete
96.15384615384616% complete


R(ead) critics data from file?,
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lcvsim


Enter algorithm: U(ser-based) or I(tem-based)i
LOO_CV_SIM Evaluation
2.65 % complete
5.30 % complete
7.95 % complete
10.60 % complete
13.26 % complete
15.91 % complete
18.56 % complete
21.21 % complete
23.86 % complete
26.51 % complete
29.16 % complete
31.81 % complete
34.46 % complete
37.12 % complete
```

```
39.77 % complete
42.42 % complete
45.07 % complete
47.72 % complete
50.37 % complete
53.02 % complete
55.67 % complete
58.32 % complete
60.98 % complete
63.63 % complete
66.28 % complete
68.93 % complete
71.58 % complete
74.23 % complete
76.88 % complete
79.53 % complete
82.18 % complete
84.84 % complete
87.49 % complete
90.14 % complete
92.79 % complete
C:\Users\lunas\anaconda3\lib\site-packages\numpy\lib\function_base.py:380:
RuntimeWarning: Mean of empty slice.
  avg = a.mean(axis)
95.44 % complete
98.09 % complete
Errors for MLK-100k: MSE = nan, MAE = nan, RMSE = nan, len(SE list): 0, using
sim_distance with sim_threshold >0.3 and sim_weighting of 0/50



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