plot 2

July 28, 2019

```
In [1]: import pandas as pd
        from pandas import set_option
        import numpy as np
        import matplotlib.pyplot as plt
In [2]: creditcard=pd.read_excel(r'C:\Users\Olawale\Desktop\cool\Credit Card.xlsx')
In [3]: creditcard.head()
Out [3]:
                                 V2
                                           VЗ
                                                      ۷4
                                                                ۷5
                                                                          V6
                                                                                    ۷7
                                                                                        \
           Time
                       V1
        0
                                                                             0.239599
              0 -1.359807 -0.072781
                                    2.536347
                                               1.378155 -0.338321
                                                                    0.462388
        1
                          0.266151 0.166480
                                               0.448154 0.060018 -0.082361 -0.078803
              0 1.191857
        2
              1 -1.358354 -1.340163 1.773209
                                               0.379780 -0.503198
                                                                    1.800499
              1 -0.966272 -0.185226 1.792993 -0.863291 -0.010309
                                                                    1.247203
                                                                              0.237609
              2 -1.158233
                           0.877737
                                    1.548718
                                               0.403034 -0.407193
                                                                    0.095921
                 V8
                           V9
                                           V21
                                                      V22
                                                                V23
                                                                          V24
          0.098698
                    0.363787
                                     -0.018307
                                                0.277838 -0.110474
                                                                     0.066928
        1 0.085102 -0.255425
                                     -0.225775 -0.638672
                                                          0.101288 -0.339846
        2 0.247676 -1.514654
                                                0.771679
                                                          0.909412 -0.689281
                                      0.247998
        3 0.377436 -1.387024
                                     -0.108300
                                                0.005274 -0.190321 -1.175575
        4 -0.270533 0.817739
                                     -0.009431
                                                0.798278 -0.137458
                                                            Class
                V25
                          V26
                                    V27
                                              V28
                                                   Amount
        0 0.128539 -0.189115 0.133558 -0.021053
                                                    149.62
                                                                0
        1 0.167170 0.125895 -0.008983
                                         0.014724
                                                      2.69
                                                                0
        2 -0.327642 -0.139097 -0.055353 -0.059752
                                                   378.66
        3 0.647376 -0.221929
                              0.062723
                                         0.061458
                                                   123.50
                                                                0
        4 -0.206010 0.502292
                               0.219422
                                         0.215153
                                                     69.99
        [5 rows x 31 columns]
In [4]: X=creditcard.iloc[:,:-1]
        Y=creditcard.iloc[:,-1]
In [5]: fig = plt.figure()
        ax = fig.add_subplot(111)
        cax = ax.matshow(X.corr(), vmin=-1, vmax=1, interpolation='none')
```

fig.colorbar(cax)
plt.show()

