facial-expression

August 29, 2023

[1]: `pip install deepface`

Requirement already satisfied: deepface in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages
(0.0.65)Note: you may need to restart the kernel to use updated packages.

WARNING: You are using pip version 20.3.3; however, version 21.1.3 is available.
You should consider upgrading via the
'c:\users\arbeena\appdata\local\programs\python\python38\python.exe -m pip
install --upgrade pip' command.

Requirement already satisfied: pandas>=0.23.4 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (1.2.3)
Requirement already satisfied: Pillow>=5.2.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (8.2.0)
Requirement already satisfied: keras>=2.2.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (2.3.1)
Requirement already satisfied: Flask>=1.1.2 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (2.0.1)
Requirement already satisfied: retina-face>=0.0.1 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (0.0.4)
Requirement already satisfied: tqdm>=4.30.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (4.61.2)
Requirement already satisfied: tensorflow>=1.9.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (2.1.0)
Requirement already satisfied: gdown>=3.10.1 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (3.13.0)
Requirement already satisfied: numpy>=1.14.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (1.18.2)

Requirement already satisfied: mtcnn>=0.1.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (0.1.1)
Requirement already satisfied: opencv-python>=3.4.4 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
deepface) (4.2.0.34)
Requirement already satisfied: Jinja2>=3.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
Flask>=1.1.2->deepface) (3.0.1)
Requirement already satisfied: Werkzeug>=2.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
Flask>=1.1.2->deepface) (2.0.1)
Requirement already satisfied: itsdangerous>=2.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
Flask>=1.1.2->deepface) (2.0.1)
Requirement already satisfied: click>=7.1.2 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
Flask>=1.1.2->deepface) (8.0.1)
Requirement already satisfied: colorama in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
click>=7.1.2->Flask>=1.1.2->deepface) (0.4.4)
Requirement already satisfied: filelock in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
gdown>=3.10.1->deepface) (3.0.12)
Requirement already satisfied: six in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
gdown>=3.10.1->deepface) (1.15.0)
Requirement already satisfied: requests[socks]>=2.12.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
gdown>=3.10.1->deepface) (2.25.0)
Requirement already satisfied: MarkupSafe>=2.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
Jinja2>=3.0->Flask>=1.1.2->deepface) (2.0.1)
Requirement already satisfied: pyyaml in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
keras>=2.2.0->deepface) (5.3.1)
Requirement already satisfied: scipy>=0.14 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
keras>=2.2.0->deepface) (1.4.1)
Requirement already satisfied: keras-applications>=1.0.6 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
keras>=2.2.0->deepface) (1.0.8)
Requirement already satisfied: keras-preprocessing>=1.0.5 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
keras>=2.2.0->deepface) (1.1.2)
Requirement already satisfied: h5py in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
keras>=2.2.0->deepface) (2.10.0)

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Requirement already satisfied: pytz>=2017.3 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
pandas>=0.23.4->deepface) (2021.1)
Requirement already satisfied: python-dateutil>=2.7.3 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
pandas>=0.23.4->deepface) (2.8.1)
Requirement already satisfied: urllib3<1.27,>=1.21.1 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
requests[socks]>=2.12.0->gdown>=3.10.1->deepface) (1.26.2)
Requirement already satisfied: idna<3,>=2.5 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
requests[socks]>=2.12.0->gdown>=3.10.1->deepface) (2.10)
Requirement already satisfied: certifi>=2017.4.17 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
requests[socks]>=2.12.0->gdown>=3.10.1->deepface) (2020.12.5)
Requirement already satisfied: chardet<4,>=3.0.2 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
requests[socks]>=2.12.0->gdown>=3.10.1->deepface) (3.0.4)
Requirement already satisfied: PySocks!=1.5.7,>=1.5.6 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
requests[socks]>=2.12.0->gdown>=3.10.1->deepface) (1.7.1)
Requirement already satisfied: wheel>=0.26 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (0.36.2)
Requirement already satisfied: wrapt>=1.11.1 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (1.12.1)
Requirement already satisfied: google-pasta>=0.1.6 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (0.2.0)
Requirement already satisfied: absl-py>=0.7.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (0.11.0)
Requirement already satisfied: astor>=0.6.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (0.8.1)
Requirement already satisfied: protobuf>=3.8.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (3.14.0)
Requirement already satisfied: gast==0.2.2 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (0.2.2)
Requirement already satisfied: tensorflow-estimator<2.2.0,>=2.1.0rc0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (2.1.0)
Requirement already satisfied: grpcio>=1.8.6 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (1.32.0)
```

```
Requirement already satisfied: termcolor>=1.1.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (1.1.0)
Requirement already satisfied: tensorboard<2.2.0,>=2.1.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (2.1.1)
Requirement already satisfied: opt-einsum>=2.3.2 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorflow>=1.9.0->deepface) (3.3.0)
Requirement already satisfied: markdown>=2.6.8 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface) (3.3.3)
Requirement already satisfied: setuptools>=41.0.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface) (51.0.0)
Requirement already satisfied: google-auth<2,>=1.6.3 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface) (1.24.0)
Requirement already satisfied: google-auth-oauthlib<0.5,>=0.4.1 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface) (0.4.2)
Requirement already satisfied: cachetools<5.0,>=2.0.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
google-auth<2,>=1.6.3->tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface)
(4.2.0)
Requirement already satisfied: pyasn1-modules>=0.2.1 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
google-auth<2,>=1.6.3->tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface)
(0.2.8)
Requirement already satisfied: rsa<5,>=3.1.4 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
google-auth<2,>=1.6.3->tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface)
(4.6)
Requirement already satisfied: requests-oauthlib>=0.7.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
google-auth-
oauthlib<0.5,>=0.4.1->tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface)
(1.3.0)
Requirement already satisfied: pyasn1<0.5.0,>=0.4.6 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
pyasn1-modules>=0.2.1->google-
auth<2,>=1.6.3->tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface) (0.4.8)
Requirement already satisfied: oauthlib>=3.0.0 in
c:\users\arbeena\appdata\local\programs\python\python38\lib\site-packages (from
requests-oauthlib>=0.7.0->google-auth-
oauthlib<0.5,>=0.4.1->tensorboard<2.2.0,>=2.1.0->tensorflow>=1.9.0->deepface)
(3.1.0)
```
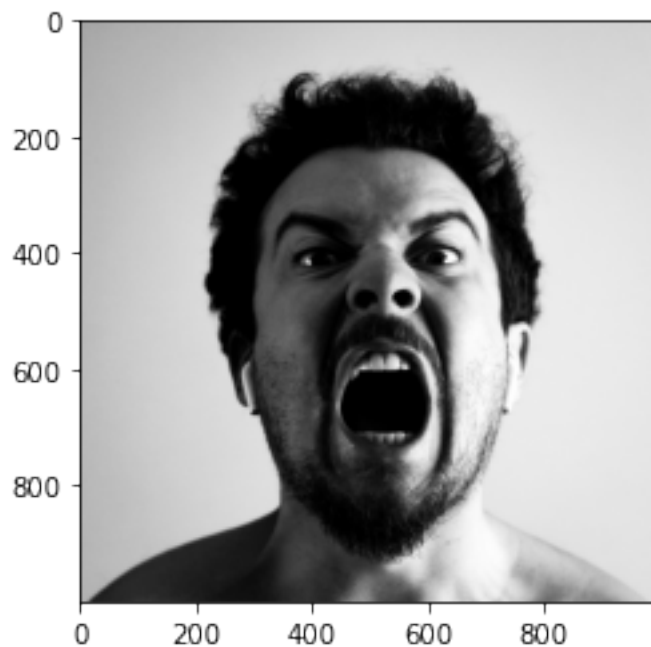
```
[ ]:  # deeplearning is a wider range of ml and AI which deals with human behaviour␣
      ↪ex: chatbox, rob
```

```
[2]:  from deepface import DeepFace # module which has facial recognation properties␣
      ↪(it identifies diffrent properties of face)
```

```
[3]:  import cv2 # module which works images
```

```
[4]:  import matplotlib.pyplot as plt
```

```
[5]:  img60=cv2.imread('C:/Users/Arbeena/Downloads/ssi/deepface-master/tests/dataset/
      ↪img60.jpg')
      plt.imshow(img60)
      plt.show()
```



```
[6]:  result = DeepFace.analyze(img60,actions = ['emotion','age']) #age, gender, race
```

```
age_model_weights.h5 will be downloaded…

Downloading…
From: https://github.com/serengil/deepface_models/releases/download/v1.0/age_mod
el_weights.h5
To: C:\Users\Arbeena\.deepface\weights\age_model_weights.h5
100%|
   | 539M/539M [03:47<00:00, 2.37MB/s]
Action: age:
```

```
100%|                                  |
2/2 [00:08<00:00,  4.05s/it]
```

[7]:
```python
print(result)
```

```
{'emotion': {'angry': 85.94112396240234, 'disgust': 1.1179470504885103e-05,
'fear': 13.967928290367126, 'happy': 0.00018156553096559946, 'sad':
0.0831378682050854, 'surprise': 2.7786475897961793e-08, 'neutral':
0.007623159035574645}, 'dominant_emotion': 'angry', 'region': {'x': 283, 'y':
206, 'w': 484, 'h': 484}, 'age': 24}
```

[ ]: