**MOUNTING GOOGLE DRIVE**

```
from google.colab import drive
drive.mount('/content/grive')
```

```
from time import *;
sleep(10)
```

# IMPORTING REQUESTS PACKAGE TO READ JSON

[ ] ↳ *4 cells hidden*

## Testting Json File

[ ] ↳ *2 cells hidden*

## Name of all State of India

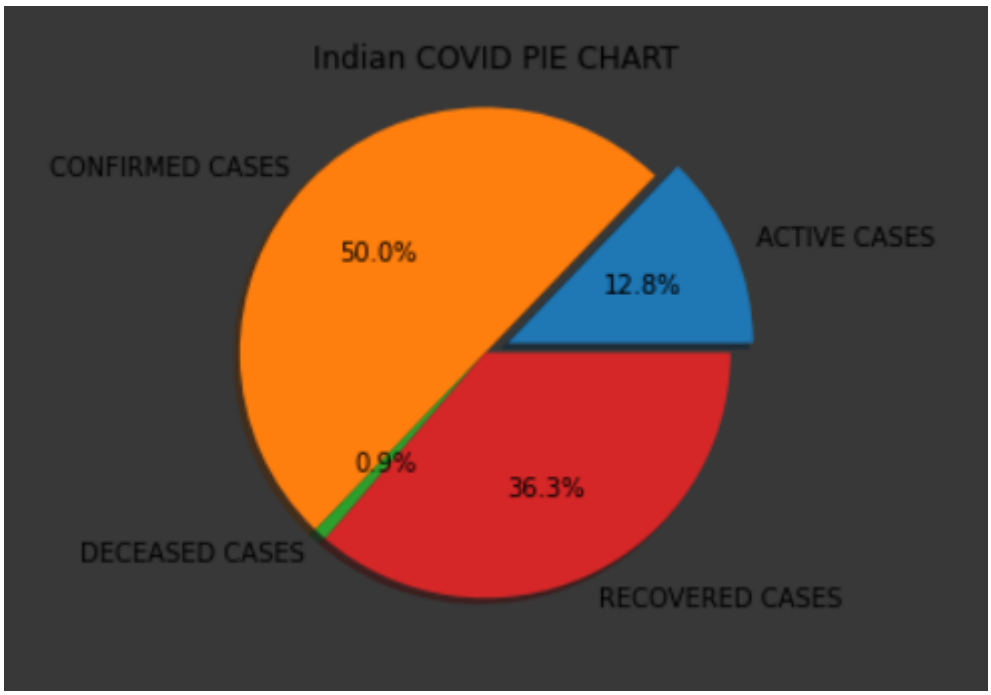
[ ] ↳ *1 cell hidden*

## Getting Names District (740) as per 2020

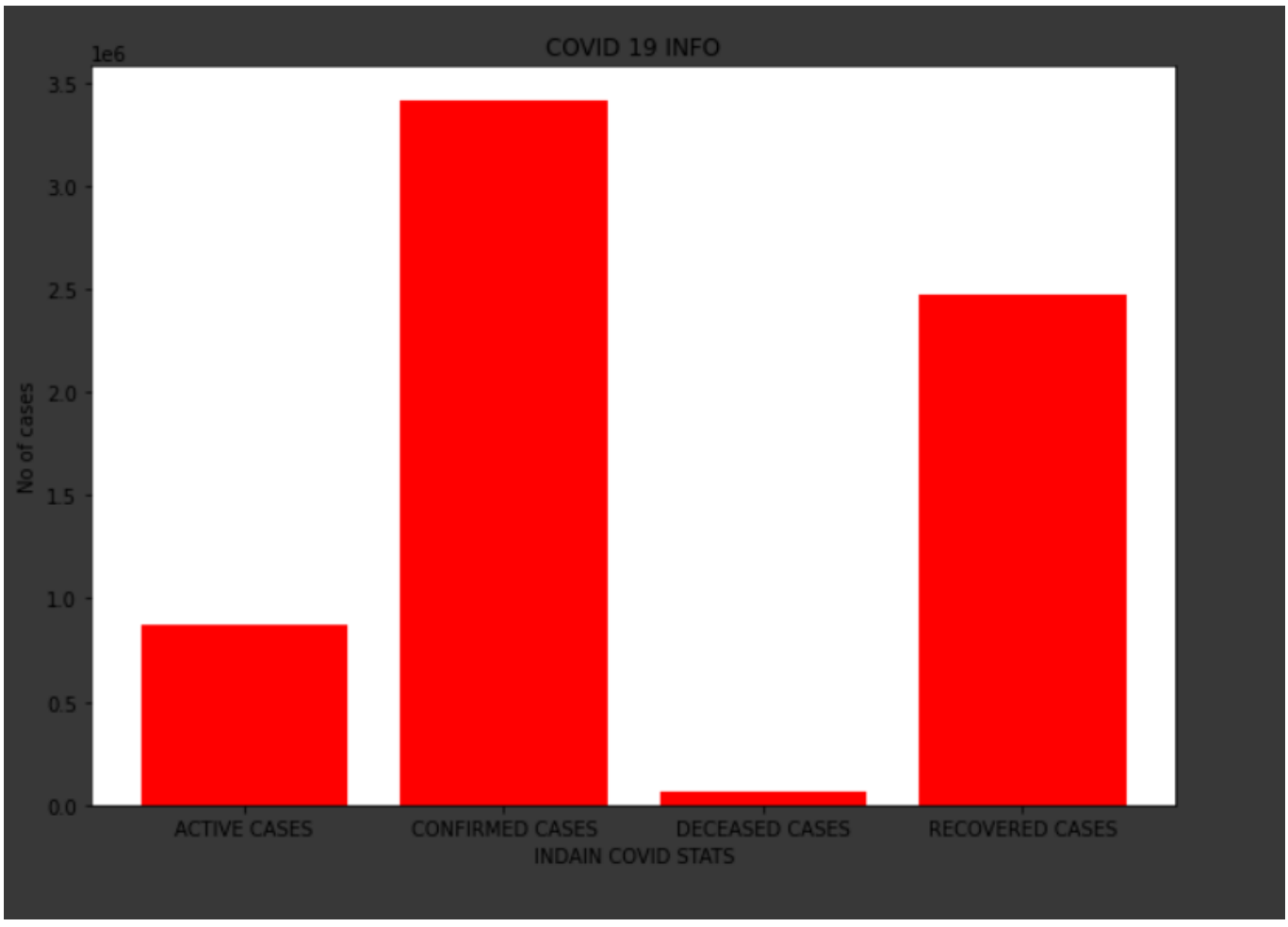
## Few District are removed from csv due to error in json

[ ] ↳ *1 cell hidden*

## Segregating District StateWise To ploat Charts and Graphs




## Pie Charts




## Bar Graphs

[ ] *1 cell hidden*

# Getting District Wise Number of Cases Using StateName &union territories

[ ] ↳ 3 cells hidden

## Creating List StateWise

```
> biharactive- To get all the cases district Wise
> bihars-To get all district Name (1d )list
# >bihars_act-list to calculate total sum of active cases to plot graphs
```

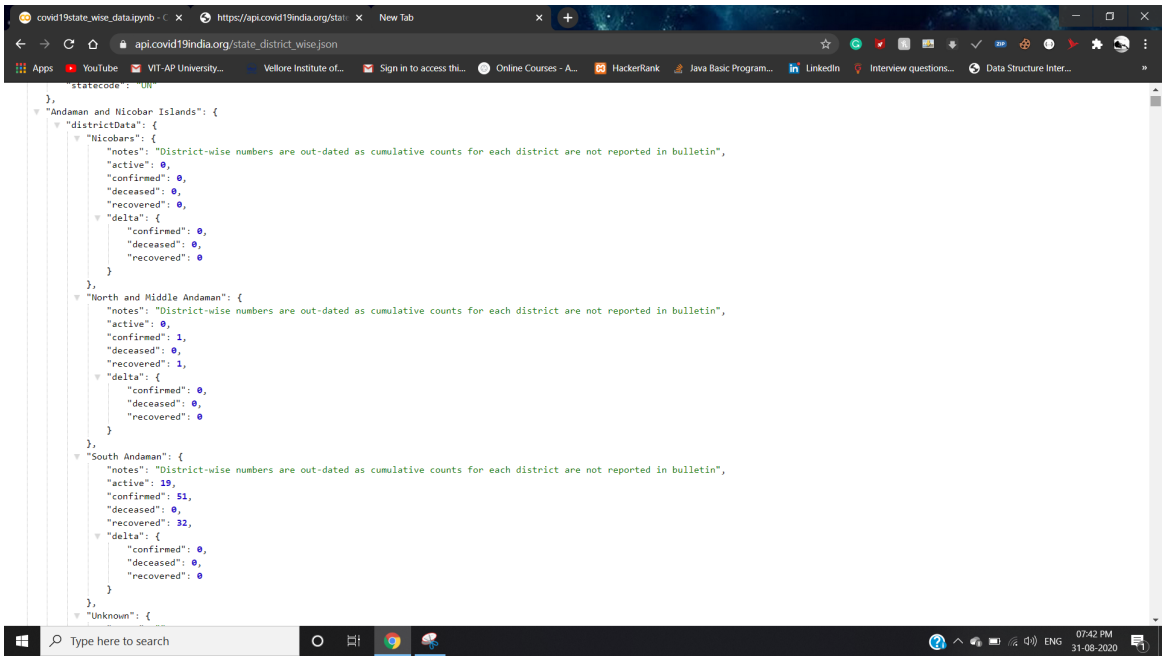
[ ] ↳ 40 cells hidden

## Calculating Longitude & Latitude

## because json Doesnot Have location of each district.

> Using Geopy python packages

> json -[link text]




```
import geopy
from geopy.geocoders import Nominatim
nom=Nominatim(user_agent="hulk")
```

```
for i in assams:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      assams.remove(i)

lat_assams=[]
lon_assams=[]
for i in assams:
    n=nom.geocode(i)
    if n is not None:
      lat_assams.append(n.latitude)
      lon_assams.append(n.longitude)
      #print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_assams.append(0)
      lon_assams.append(0)
```

```
for i in bihars:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      bihars.remove(i)
print(bihars)
lat_bihars=[]
lon_bihars=[]
for i in bihars:
    n=nom.geocode(i)
    if n is not None:
      lat_bihars.append(n.latitude)
      lon_bihars.append(n.longitude)
      #print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_bihars.append(0)
      lon_bihars.append(0)
print(len(bihars))
print(len(lat_bihars))
```

```
['Araria', 'Arwal', 'Aurangabad', 'Banka', 'Begusarai', 'Bhagalpur', 'Bhojpur', 'Bux
38
38
```

```
for i in Chandigarhs:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Chandigarhs.remove(i)
print(Chandigarhs)
lat_Chandigarhs=[]
lon_Chandigarhs=[]
for i in Chandigarhs:
    n=nom.geocode(i)
    if n is not None:
      lat_Chandigarhs.append(n.latitude)
      lon_Chandigarhs.append(n.longitude)
```

```
        print("name-",n,"latitude",n.latitude,"lon",n.longitude)
      else :
        lat_Chandigarhs.append(0)
        lon_Chandigarhs.append(0)
```

```
['Chandigarh']
name- Chandigarh, India latitude 30.7194022 lon 76.7646552
```

```
for i in Chhattisgarhs:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Chhattisgarhs.remove(i)
print(Chhattisgarhs)
lat_Chhattisgarhs=[]
lon_Chhattisgarhs=[]
for i in Chhattisgarhs:
    n=nom.geocode(i)
    if n is not None:
      lat_Chhattisgarhs.append(n.latitude)
      lon_Chhattisgarhs.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Chhattisgarhs.append(0)
      lon_Chhattisgarhs.append(0)
```

```
['Balod', 'Baloda Bazar', 'Balrampur', 'Bametara', 'Bastar', 'Bijapur', 'Bilaspur',
name- Balod, Chhattisgarh, India latitude 20.73218365 lon 81.14335738365043
name- Baloda Bazar, Chhattisgarh, India latitude 21.572645950000002 lon 82.436706916
name- Balrampur, Uttar Pradesh, India latitude 27.4504805 lon 82.39541774073132
name- Bastar, Chhattisgarh, India latitude 19.11912825 lon 81.82918648971713
name- Bijapur, Chhattisgarh, India latitude 18.769041350000002 lon 80.74151192966231
name- Bilaspur, Rampur, Uttar Pradesh, 244921, India latitude 28.8680526 lon 79.2983
name- Dhamtari, Dhamtari Tahsil, Dhamtari, Chhattisgarh, 493773, India latitude 20.7
name- Durg, Chhattisgarh, India latitude 21.19903535 lon 81.3979545573657
name- Gariaband, Chhattisgarh, India latitude 20.42857015 lon 82.24698984817437
name- Janjgir-Champa, Chhattisgarh, India latitude 21.967126399999998 lon 82.6647242
name- Jashpur, Chhattisgarh, India latitude 22.76678355 lon 83.95304518953317
name- Kondagaon, Kondagaon Tahsil, Kondagaon, Chhattisgarh, 494226, India latitude 1
name- Korba, Chhattisgarh, India latitude 22.51976955 lon 82.62951462416818
name- Koriya, Chhattisgarh, India latitude 23.431414349999997 lon 82.31393341197054
name- Mahasamund, Chhattisgarh, India latitude 21.1882332 lon 82.48484762499999
name- Mungeli, Mungeli Tahsil, Mungeli, Chhattisgarh, 495334, India latitude 22.0661
name- Narayanpur, Lakhimpur, Assam, India latitude 26.96392335 lon 93.82558573585581
name- Raigarh, Chhattisgarh, India latitude 22.5 lon 83.5
name- Raipur, Raipur Tahsil, Raipur, Chhattisgarh, 493332, India latitude 21.2379469
name- Rajnandgaon, Chhattisgarh, India latitude 20.9727404 lon 80.69155548263583
name- Sukma, Chhattisgarh, India latitude 18.26654225 lon 81.29252341475065
name- Surajpur, Chhattisgarh, India latitude 23.35151515 lon 82.97290272665015
name- Surguja, Chhattisgarh, India latitude 22.94941835 lon 83.1655491457949
name- Uttar Bastar Kanker, Chhattisgarh, India latitude 20.1270026 lon 80.9810934947
name- Marwahi, Marwahi Tahsil, Gaurela-Pendra-Marwahi district, Chhattisgarh, India
```

```
for i in Delhis:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Delhis.remove(i)
print(Delhis)
```

```
print(Delhis)
lat_Delhis=[]
lon_Delhis=[]
for i in Delhis:
    n=nom.geocode(i)
    if n is not None:
      lat_Delhis.append(n.latitude)
      lon_Delhis.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Delhis.append(0)
      lon_Delhis.append(0)
```

```
['Central Delhi', 'East Delhi', 'New Delhi', 'North Delhi', 'North East Delhi', 'Nor
name- Central Delhi, Delhi, India latitude 28.69854835 lon 77.21939141568413
name- East Delhi, Delhi, India latitude 28.6204767 lon 77.30918071344418
name- New Delhi, Delhi, India latitude 28.6138954 lon 77.2090057
name- New Delhi, Delhi, India latitude 28.6138954 lon 77.2090057
name- North East Delhi, Delhi, India latitude 28.72330795 lon 77.26685650778668
name- New Delhi, Delhi, India latitude 28.6138954 lon 77.2090057
name- Shahdara, Bholanath Nagar Marg, Shahdara, Vivek Vihar Tehsil, Shahdara, Delhi,
name- South Delhi, Delhi, India latitude 28.485169399999997 lon 77.19637972381611
name- South East Delhi, Delhi, India latitude 28.5444411 lon 77.27287301731174
name- South West Delhi, Delhi, India latitude 28.58644805 lon 76.97915298462692
name- West Delhi, Delhi, India latitude 28.6479519 lon 77.08556541088615
```

```
for i in Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s.remove(i)
print(Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s)
lat_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s=[]
lon_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s=[]
for i in Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s.append(n.latitude)
      lon_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s.append(0)
      lon_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s.append(0)
```

```
['Dadra and Nagar Haveli', 'Daman', 'Diu']
name- Dadra and Nagar Haveli, Dadra and Nagar Haveli and Daman and Diu, India latitu
name- Daman, Dadra and Nagar Haveli and Daman and Diu, India latitude 20.42000485 lo
name- Diu, Dadra and Nagar Haveli and Daman and Diu, India latitude 20.7137783 lon 7
```

```
for i in Goa_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Goa_s.remove(i)
print(Goa_s)
lat_Goa_s=[]
lon_Goa_s=[]
for i in Goa_s:
    n=nom.geocode(i)
```

```
    if n is not None:
      lat_Goa_s.append(n.latitude)
      lon_Goa_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Goa_s.append(0)
      lon_Goa_s.append(0)
```

```
['North Goa', 'South Goa']
name- North Goa, Goa, India latitude 15.60444125 lon 74.00172406307475
name- South Goa, Goa, India latitude 15.21961365 lon 74.1152813019196
```

```
for i in Gujarat_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Gujarat_s.remove(i)
print(Gujarat_s)
lat_Gujarat_s=[]
lon_Gujarat_s=[]
for i in Gujarat_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Gujarat_s.append(n.latitude)
      lon_Gujarat_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Gujarat_s.append(0)
      lon_Gujarat_s.append(0)
```

```
['Ahmedabad', 'Amreli', 'Anand', 'Aravalli', 'Banaskantha', 'Bharuch', 'Bhavnagar',
name- Ahmedabad, Ahmadabad City Taluka, Ahmedabad District, Gujarat, 380001, India l
name- Amreli, Gir Somnath District, Gujarat, 362710, India latitude 20.866667 lon 70
name- Anand, Anand Taluka, Anand District, Gujarat, 388001, India latitude 22.558499
name- Aravalli, Attili, West Godavari, Andhra Pradesh, 534209, India latitude 16.629
```

```
for i in Himachal_Pradesh_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Himachal_Pradesh_s.remove(i)
print(Himachal_Pradesh_s)
lat_Himachal_Pradesh_s=[]
lon_Himachal_Pradesh_s=[]
for i in Himachal_Pradesh_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Himachal_Pradesh_s.append(n.latitude)
      lon_Himachal_Pradesh_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Himachal_Pradesh_s.append(0)
      lon_Himachal_Pradesh_s.append(0)
```

```
['Bilaspur', 'Chamba', 'Hamirpur', 'Kangra', 'Kinnaur', 'Kullu', 'Lahaul and Spiti',
name- Bilaspur, Rampur, Uttar Pradesh, 244921, India latitude 28.8680526 lon 79.2983
name- La Chamba, Montbrison, Loire, Auvergne-Rhône-Alpes, France métropolitaine, 424
name- Hamīrpur, Hamirpur, Uttar Pradesh, India latitude 25.75 lon 80.0
name- Kangra, Himachal Pradesh, India latitude 32.166667 lon 76.25
name- Kinnaur, Himachal Pradesh, India latitude 31.586346 lon 78.3968441
name- Kullu, Himachal Pradesh, India latitude 32.00186325 lon 77.37899639741332
name- Lahul and Spiti, Himachal Pradesh, India latitude 32.5038495 lon 77.5822718823
name- Mandi, Punch, Jammu and Kashmir, India latitude 33.868829899999994 lon 74.3188
name- Shimla, DC Office Road, The Retreat, Chaura Maidan, Shimla, Shimla (urban), Sh
name- Sirmaur, Himachal Pradesh, India latitude 30.75 lon 77.5
name- Solan, Himachal Pradesh, India latitude 30.92589585 lon 77.08200509063624
name- Uña, Cuenca, Castilla-La Mancha, 16152, España latitude 40.2231089 lon -1.9775
```

```
for i in Haryana_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Haryana_s.remove(i)
print(Haryana_s)
lat_Haryana_s=[]
lon_Haryana_s=[]
for i in Haryana_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Haryana_s.append(n.latitude)
      lon_Haryana_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Haryana_s.append(0)
      lon_Haryana_s.append(0)
```

```
['Ambala', 'Bhiwani', 'Charkhi Dadri', 'Faridabad', 'Fatehabad', 'Gurugram', 'Hisar'
name- Ambala, Haryana, 134002, India latitude 30.3843674 lon 76.770421
name- Bhiwani, Bhiwani district, Haryana, 125021, India latitude 28.7931703 lon 76.1
name- Charkhi Dadri, Dadri, Charkhi Dadri, Haryana, 123306, India latitude 28.591993
name- Faridabad, Haryana, 121001, India latitude 28.402837 lon 77.3085626
name- Fatehabad, Agra, Uttar Pradesh, 283111, India latitude 27.02766825 lon 78.2074
name- Gurugram, Haryana, India latitude 28.4646148 lon 77.0299194
name- Hisar, Haryana, India latitude 29.168807 lon 75.7461103
name- Italian's, Rodovia Governador Leonel de Moura Brizola, Botucaray, Sede, Soleda
name- Jhajjar, Haryana, India latitude 28.5336844 lon 76.68981212035648
name- Jīnd, Jind, Haryana, India latitude 29.5 lon 76.25
name- Kaithal, Haryana, India latitude 29.74477075 lon 76.35092772284784
name- Karnal, Haryana, 132001, India latitude 29.6803266 lon 76.9896254
name- Kurukshetra, Thanesar, Kurukshetra, Haryana, 132118, India latitude 29.9693747
name- Mahendragarh, Haryana, India latitude 28.25 lon 76.166667
name- Nuh, Haryana, 122103, India latitude 28.097345150000002 lon 77.05085582101852
name- Palwal, Haryana, India latitude 28.12502575 lon 77.35831300773046
name- Panchkula, Haryana, India latitude 30.616216450000003 lon 77.04197804321875
name- Panipat, Haryana, 132100, India latitude 29.3912753 lon 76.9771675
name- Rewari, Haryana, India latitude 28.1956468 lon 76.6165179
name- Rohtak, Haryana, 124001, India latitude 28.9010899 lon 76.5801935
name- Sirsa, Haryana, India latitude 29.583333 lon 75.083333
name- Sonipat, Haryana, 131001, India latitude 29.0033144 lon 77.0167323
```

```
for i in Jharkhand_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Jharkhand_s.remove(i)
print(Jharkhand_s)
lat_Jharkhand_s=[]
lon_Jharkhand_s=[]
for i in Jharkhand_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Jharkhand_s.append(n.latitude)
      lon_Jharkhand_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Jharkhand_s.append(0)
      lon_Jharkhand_s.append(0)
```

```
['Bokaro', 'Chatra', 'Deoghar', 'Dhanbad', 'Dumka', 'East Singhbhum', 'Garhwa', 'Gir
name- Bokaro, Jharkhand, India latitude 23.699127949999998 lon 85.99106894165021
name- Chatra, Jharkhand, India latitude 24.20162495 lon 84.87817691941733
name- Deoghar, Jharkhand, 814112, India latitude 24.4766423 lon 86.60673245386945
name- Dhanbad, Dhanbad-Cum-Kenduadih-Cum-Jagata, Dhanbad, Jharkhand, 826001, India l
name- Dumka, Jharkhand, India latitude 24.2538512 lon 87.30064714192224
name- Singhbhūm, Pashchimi Singhbhum, Jharkhand, India latitude 22.5 lon 85.5
name- Garhwa, Jharkhand, 822114, India latitude 24.15529035 lon 83.82522584408349
```

```
for i in Jammu_and_Kashmir_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Jammu_and_Kashmir_s.remove(i)
print(Jammu_and_Kashmir_s)
lat_Jammu_and_Kashmir_s=[]
lon_Jammu_and_Kashmir_s=[]
for i in Jammu_and_Kashmir_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Jammu_and_Kashmir_s.append(n.latitude)
      lon_Jammu_and_Kashmir_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Jammu_and_Kashmir_s.append(0)
      lon_Jammu_and_Kashmir_s.append(0)
```

```
['Anantnag', 'Bandipora', 'Baramulla', 'Budgam', 'Doda', 'Ganderbal', 'Jammu', 'Kath
name- Anantnag, Jammu and Kashmir, India latitude 33.746109950000005 lon 75.18544753
name- Bandipora, Jammu and Kashmir, India latitude 34.4563234 lon 74.68249997667994
name- Baramulla, Baramula, Jammu and Kashmir, 193101, India latitude 34.205005650000
name- Budgam, Badgam, Jammu and Kashmir, India latitude 34.04796585 lon 74.744139783
name- Doda, Jammu and Kashmir, India latitude 33.1774307 lon 75.56752281893789
name- Ganderbal, Jammu and Kashmir, India latitude 34.2880611 lon 75.03058171219789
name- Jammu, Jammu and Kashmir, 180001, India latitude 32.7185614 lon 74.8580917
name- Kathua, Jammu and Kashmir, 184204, India latitude 32.583333 lon 75.5
name- Kishtwar, Jammu and Kashmir, 182204, India latitude 33.2761171 lon 75.81692387
name- Kulgam, Jammu and Kashmir, 192231, India latitude 33.669800550000005 lon 75.01
name- Kupwara, Jammu and Kashmir, 193222, India latitude 34.611023599999996 lon 74.2
name- پاکستان ,10250 ,آزاد کشمیر ,ضلع میرپور ,نیو میرپور شہر latitude 33.1486351 lon 73.7482102
name- پاکستان ,13100 ,آزاد کشمیر ,ضلع مظفر آباد ,مظفر آباد latitude 34.3734751 lon 73.4702407
name- Pulwama, Jammu and Kashmir, India latitude 33.89829355 lon 74.89634093792017
name- Punch, Jammu and Kashmir, 185101, India latitude 33.702939 lon 74.249901515471
name- Rajouri, Rajauri, Jammu and Kashmir, India latitude 33.3772495 lon 74.3132332
name- Ramban, Jammu and Kashmir, India latitude 33.211637100000004 lon 75.2050989075
name- Reasi, Jammu and Kashmir, India latitude 33.069103150000004 lon 74.83786982088
name- Samba, Passoré, Nord, Burkina Faso latitude 12.7052899 lon -2.4007251419869844
name- Srinagar, Srinagar (South), Srinagar, Jammu and Kashmir, 190008, India latitud
name- Udhampur, Jammu and Kashmir, 182101, India latitude 33.0 lon 75.166667
```

```
for i in Karnataka_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Karnataka_s.remove(i)
print(Karnataka_s)
lat_Karnataka_s=[]
lon_Karnataka_s=[]
for i in Karnataka_s:
    n=nom.geocode(i)
    if n is not None:
```

```
    if n is not None:
      lat_Karnataka_s.append(n.latitude)
      lon_Karnataka_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Karnataka_s.append(0)
      lon_Karnataka_s.append(0)
```

```
['Bagalkote', 'Ballari', 'Belagavi', 'Bengaluru Rural', 'Bengaluru Urban', 'Bidar',
name- Bagalkote, Bagalakote taluk, Bagalkote district, Karnataka, 587102, India lati
name- Ballari, Bellary district, Karnataka, India latitude 15.2485413 lon 76.8323648
name- Belagavi, Belagavi taluku, Belgaum district, Karnataka, 590001, India latitude
name- Bangalore Rural, Karnataka, India latitude 13.18077825 lon 77.34174236923371
name- Bangalore Urban, Karnataka, India latitude 12.94514225 lon 77.55364499971128
name- Bidart, Bayonne, Pyrénées-Atlantiques, Nouvelle-Aquitaine, France métropolitai
name- Chamarajanagara, Chamarajanagara taluk, Chamarajanagar district, Karnataka, 57
name- Chikkaballapura, Chikkaballapura taluk, Chikkaballapura district, Karnataka, 5
name- Chikkamagaluru, Chikkamagaluru district, Karnataka, India latitude 13.5 lon 75
name- Chitradurga, Chitradurga taluku, Chitradurga district, Karnataka, 577500, Indi
name- Dakshina Kannada, Uppinangadi, Putturu taluk, Dakshina Kannada, Karnataka, Ind
name- Davanagere, Davanagere taluku, Davanagere district, Karnataka, 577000, India l
name- Dharwad, Dharawada taluku, Dharwad district, Karnataka, 580001, India latitude
name- Gadag, Gadag taluk, Gadag district, Karnataka, 582101, India latitude 15.42636
name- Hassan, Hasana taluk, Hassan district, Karnataka, 573201, India latitude 13.00
name- Haveri, Haveri taluku, Haveri district, Karnataka, 581110, India latitude 14.7
name- Kalaburagi, Kalaburagi district, Karnataka, India latitude 17.166667 lon 77.08
name- Kodagu, Karnataka, India latitude 12.3822808 lon 75.66523533586208
name- Kolar, Kolar taluk, Kolar district, Karnataka, 563101, India latitude 13.13699
name- Koppala, Koppala taluku, Koppal district, Karnataka, 583231, India latitude 15
name- Mandya, Mandya taluk, Mandya district, Karnataka, 571401, India latitude 12.52
name- Mysuru, Mysuru taluk, Mysuru district, Karnataka, 570001, India latitude 12.30
name- Raichur, Raichur district, Karnataka, India latitude 16.083333 lon 77.166667
name- Ramanagara, Ramanagara taluk, Ramanagara district, Karnataka, 571511, India la
name- Shivamogga, Shivamogga taluku, Shimoga district, Karnataka, 577200, India lati
name- Tumakuru, Tumkur taluk, Tumkur district, Karnataka, 572101, India latitude 13.
name- Udupi, Udupi taluku, Udupi district, Karnataka, 576101, India latitude 13.3419
name- Uttara Kannada, Karnataka, India latitude 14.724474149999999 lon 74.6422373449
name- Vijayapura, Bijapur district, Karnataka, India latitude 16.666667 lon 75.91666
name- Yadgir, Yadagiri taluku, Yadagiri district, Karnataka, 585200, India latitude
```

```
for i in Kerala_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Kerala_s.remove(i)
print(Kerala_s)
lat_Kerala_s=[]
lon_Kerala_s=[]
for i in Kerala_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Kerala_s.append(n.latitude)
      lon_Kerala_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Kerala_s.append(0)
      lon_Kerala_s.append(0)
```

```
['Alappuzha', 'Ernakulam', 'Idukki', 'Kannur', 'Kasaragod', 'Kollam', 'Kottayam', 'K
name- Alappuzha, Kerala, India latitude 9.48870715 lon 76.41521381074048
name- Ernakulam, Kanayannur, Ernakulam district, Kerala, 682 017, India latitude 9.9
name- Idukki, Kerala, India latitude 9.8497872 lon 76.9797914
name- Kannur, Kannur district, Kerala, 670012, India latitude 11.8762254 lon 75.3738
name- Kasaragod, Kerala, India latitude 12.421713050000001 lon 75.19044977266321
name- Kollam, Kerala, 691001, India latitude 8.8879509 lon 76.5955013
name- Kottayam, Kerala, India latitude 9.6287383 lon 76.64553257124857
name- Kozhikode, Kozhikode district, Kerala, 673032, India latitude 11.2586082 lon 7
name- Malappuram, Kerala, India latitude 11.10684475 lon 76.10995510466662
name- Palakkad, Robinson Road, Manjakulam, Palakkad, Palghat, Kerala, 678001, India
name- Pathanamthitta, Kerala, India latitude 9.27854005 lon 76.97405942942743
name- Thiruvananthapuram, Kerala, 695001, India latitude 8.5241122 lon 76.9360573
name- Thrissur, Thrissur district, Kerala, 680001, India latitude 10.5256264 lon 76.
name- Wayanad, Kerala, India latitude 11.715219000000001 lon 76.12690294658198
```

```
for i in Nagaland_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Nagaland_s.remove(i)
print(Kerala_s)
lat_Nagaland_s=[]
lon_Nagaland_s=[]
for i in Nagaland_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Nagaland_s.append(n.latitude)
      lon_Nagaland_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Nagaland_s.append(0)
      lon_Nagaland_s.append(0)
```

```
['Alappuzha', 'Ernakulam', 'Idukki', 'Kannur', 'Kasaragod', 'Kollam', 'Kottayam', 'K
name- Others, Francisco O. Santos, Umali Subdivision, Batong Malake, Los Baños, Lagu
name- Dimapur, Dimapur Sadar, Dimapur, Nagaland, 797112, India latitude 25.9135914 l
name- Kiphire, Nagaland, 798611, India latitude 25.81551155 lon 94.84166400470303
name- Kohīma, Kohima, Nagaland, India latitude 25.75 lon 94.166667
name- Longleng, Nagaland, 798625, India latitude 26.49031725 lon 94.77214247303138
name- Mokokchung, Nagaland, India latitude 26.4795861 lon 94.51052754768273
name- Isle of Man latitude 54.2358167 lon -4.514598745698255
name- Peren, Nagaland, 797101, India latitude 25.47907705 lon 93.72563659313207
name- Phek, Nagaland, India latitude 25.75 lon 94.5
name- Tuensang, Nagaland, India latitude 26.168505500000002 lon 94.85819821659115
name- Wokha, Nagaland, India latitude 26.166667 lon 94.25
name- Zunheboto, Nagaland, 798620, India latitude 26.0 lon 94.5
```

```
for i in Ladakh_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Ladakh_s.remove(i)
print(Ladakh_s)
lat_Ladakh_s=[]
lon_Ladakh_s=[]
for i in Ladakh_s:
    n=nom.geocode(i)
    if n is not None:
```

```
    if n is not None:
      lat_Ladakh_s.append(n.latitude)
      lon_Ladakh_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Ladakh_s.append(0)
      lon_Ladakh_s.append(0)
```

```
['Kargil', 'Leh']
name- Kargil, Kargil District, Ladakh, 194103, India latitude 34.420542600000005 lon
name- Leh, Leh District, Ladakh, 0194101, India latitude 34.1642029 lon 77.5848133
```

```
for i in Lakshadweep_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Lakshadweep_s.remove(i)
print(Lakshadweep_s)
lat_Lakshadweep_s=[]
lon_Lakshadweep_s=[]
for i in Lakshadweep_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Lakshadweep_s.append(n.latitude)
      lon_Lakshadweep_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Lakshadweep_s.append(0)
      lon_Lakshadweep_s.append(0)
```

```
['Lakshadweep']
name- Lakshadweep, India latitude 10.8832771 lon 72.8171069
```

```
for i in Maharashtra_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Maharashtra_s.remove(i)
print(Maharashtra_s)
lat_Maharashtra_s=[]
lon_Maharashtra_s=[]
for i in Maharashtra_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Maharashtra_s.append(n.latitude)
      lon_Maharashtra_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Maharashtra_s.append(0)
      lon_Maharashtra_s.append(0)
```

```
['Ahmednagar', 'Akola', 'Amravati', 'Aurangabad', 'Beed', 'Bhandara', 'Buldhana', 'C
name- Ahmednagar, Maharashtra, India latitude 19.162772500000003 lon 74.858024300851
name- Akola, Maharashtra, India latitude 20.7618624 lon 77.19217162524623
name- Amravati, Maharashtra, India latitude 21.15454115 lon 77.64429617998744
name- Aurangabad, Maharashtra, 431002, India latitude 19.877263 lon 75.3390241
name- Beed, Bid, Maharashtra, 431122, India latitude 18.9904059 lon 75.7542291
name- Bhandara, Rapti, चितवन, वाग्मती प्रदेश, Nepal latitude 27.604285400000002 lon 84.64
name- Buldhana, Maharashtra, India latitude 20.583333 lon 76.416667
name- Chandrapur, Kamrup Metropolitan, Assam, India latitude 26.21231825 lon 91.8962
name- Dhule, Maharashtra, India latitude 21.13050145 lon 74.47891180551228
name- Gadchiroli, Maharashtra, India latitude 19.759070350000002 lon 80.162280725801
name- Gondia, Gondiya Taluka, Gondiya District, Maharashtra, 441600, India latitude
name- Hingoli, Maharashtra, India latitude 19.54140965 lon 77.17376601317515
name- Jalgaon, Maharashtra, India latitude 20.84351185 lon 75.52592658756026
name- Jalna, Maharashtra, India latitude 19.9182328 lon 75.8686246900443
name- Kolhapur, Kolhapur district, Maharashtra, 416003, India latitude 16.7028412 lo
name- Latur, Maharashtra, India latitude 18.35146855 lon 76.7551212230513
name- Mumbai, Mumbai City, Maharashtra, India latitude 18.9387711 lon 72.8353355
name- Mumbai Suburban, Maharashtra, India latitude 19.13095765 lon 72.88593095460952
name- Nagpur, Nagpur Urban Taluka, Nagpur District, Maharashtra, 440001, India latit
name- Nanded, Nanded district, Maharashtra, India latitude 19.17257215 lon 77.291412
name- Nandurbar, Nandubar, Maharashtra, 425412, India latitude 21.365998949999998 lo
name- Nashik, Maharashtra, 422001, India latitude 20.0112475 lon 73.7902364
name- Osmanabad, Maharashtra, India latitude 18.16984395 lon 76.11796321159572
name- Palghar, Maharashtra, India latitude 19.68086385 lon 72.82537342511341
name- Parbhani, Maharashtra, India latitude 19.29031365 lon 76.60290343431203
name- Pune District, Maharashtra, India latitude 18.6452489 lon 73.92318563785392
name- Raigad, Maharashtra, India latitude 18.4928092 lon 73.13807095426539
name- Ratnagiri, Maharashtra, India latitude 17.282607900000002 lon 73.4569787039826
name- Sangli, Miraj, Sangli district, Maharashtra, 416416, India latitude 16.8502534
name- Satara, Maharashtra, India latitude 17.63612885 lon 74.29827807601782
```

```
for i in Meghalaya_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Meghalaya_s.remove(i)
print(Meghalaya_s)
lat_Meghalaya_s=[]
lon_Meghalaya_s=[]
for i in Meghalaya_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Meghalaya_s.append(n.latitude)
      lon_Meghalaya_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Meghalaya_s.append(0)
      lon_Meghalaya_s.append(0)
```

```
['East Garo Hills', 'East Jaintia Hills', 'East Khasi Hills', 'North Garo Hills', 'R
name- East Garo Hills, Meghalaya, 783122, India latitude 25.61849455 lon 90.63421621
```

```
for i in Manipur_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Manipur_s.remove(i)
print(Manipur_s)
lat_Manipur_s=[]
lon_Manipur_s=[]
for i in Manipur_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Manipur_s.append(n.latitude)
      lon_Manipur_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Manipur_s.append(0)
      lon_Manipur_s.append(0)
```

```
['Bishnupur', 'Chandel', 'Churachandpur', 'Imphal East', 'Imphal West', 'Jiribam', '
name- Bishnupur, Manipur, 795126, India latitude 24.562463649999998 lon 93.801248374
name- Chandel, Manipur, 795127, India latitude 24.3197442 lon 94.02109882254321
name- Churachandpur, Manipur, India latitude 24.378704 lon 93.69700149533944
name- Imphal East, Manipur, India latitude 24.85154025 lon 94.00947957721581
name- Imphal West, Manipur, India latitude 24.757326 lon 93.85847858025147
name- Jiribam, Manipur, 795116, India latitude 24.6778472 lon 93.1549000879473
name- Kakching, Manipur, India latitude 24.38904015 lon 93.88013239529906
name- Kamjong, Manipur, India latitude 24.8409769 lon 94.52830740954334
name- Kangpokpi, Kangpoki, Kangpokpi, Manipur, 795129, India latitude 25.1524326 lon
name- Noney, Tamenglong, Manipur, 795159, India latitude 24.8625867 lon 93.6237454
name- Pherzawl, Tipaimukh, Pherzawl, Manipur, India latitude 24.2595653 lon 93.19060
name- Senapati, Manipur, 795104, India latitude 25.380439600000003 lon 94.0569854178
name- Tamenglong, Manipur, India latitude 24.935401300000002 lon 93.56791112289724
name- Tengnoupal, Manipur, India latitude 24.31392145 lon 94.23756082375633
name- Thoubal, Manipur, India latitude 24.624587 lon 94.04247928402684
name- Ukhrul, Manipur, 795144, India latitude 25.109266849999997 lon 94.382392816541
```

```
for i in Madhya_Pradesh_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Madhya_Pradesh_s.remove(i)
print(Madhya_Pradesh_s)
lat_Madhya_Pradesh_s=[]
lon_Madhya_Pradesh_s=[]
for i in Madhya_Pradesh_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Madhya_Pradesh_s.append(n.latitude)
      lon_Madhya_Pradesh_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Madhya_Pradesh_s.append(0)
      lon_Madhya_Pradesh_s.append(0)
```

```
['Agar Malwa', 'Alirajpur', 'Anuppur', 'Ashoknagar', 'Balaghat', 'Barwani', 'Betul',
name- Agar Malwa, Madhya Pradesh, India latitude 23.9342963 lon 76.14523314122312
name- Alirajpur, Madhya Pradesh, India latitude 22.285939550000002 lon 74.3546860875
name- Anuppur, Madhya Pradesh, India latitude 23.03525965 lon 81.3884438474638
name- Ashoknagar, Ashoknagar Tahsil, Ashok Nagar, Madhya Pradesh, 473331, India lati
name- Bālāghāt, Balaghat District, Madhya Pradesh, India latitude 21.966667 lon 80.3
name- Barwani, Madhya Pradesh, India latitude 21.75194325 lon 74.89175175338488
name- Betul, Madhya Pradesh, India latitude 21.8796162 lon 77.87568124563079
name- Bhind, Madhya Pradesh, India latitude 26.5 lon 78.75
name- Bhopal, Madhya Pradesh, 462001, India latitude 23.2584857 lon 77.401989
name- Burhanpur, Azamgarh, Uttar Pradesh, India latitude 26.2697215 lon 82.994425367
name- Chhatarpur, Madhya Pradesh, 471105, India latitude 24.75 lon 79.75
name- Chhindwara, Madhya Pradesh, India latitude 22.139831049999998 lon 78.809644954
name- Damoh, Madhya Pradesh, India latitude 23.75 lon 79.583333
name- Datia, Madhya Pradesh, India latitude 25.75 lon 78.5
name- Dewas, Madhya Pradesh, India latitude 23.0 lon 76.166667
name- Dhār, Dhar, Madhya Pradesh, India latitude 22.5 lon 75.25
name- Dindori, Nashik, Maharashtra, 422215, India latitude 20.25527235 lon 73.807300
name- Guna, Ashok Nagar, Madhya Pradesh, India latitude 24.5 lon 77.5
name- Gwalior, Maharani LaxhmiBai Marg, Gwalior, Gwalior Tahsil, Gwalior, Madhya Pra
name- Harda, Harda Tahsil, Harda, Madhya Pradesh, 461331, India latitude 22.3388828
name- Hoshangabad, Madhya Pradesh, India latitude 22.6001502 lon 77.92664521413192
name- Indore, Madhya Pradesh, 452001, India latitude 22.7203616 lon 75.8681996
name- Jabalpur, Jabalpur Tahsil, Jabalpur, Madhya Pradesh, India latitude 23.1608938
name- Jhabua, Madhya Pradesh, India latitude 22.88585225 lon 74.72513368804519
name- Katni, Murwara Tahsil, Katni, Madhya Pradesh, 483500, India latitude 23.833962
name- Khandwa, Madhya Pradesh, India latitude 21.9778642 lon 76.5688282326971
name- Khargone, Khargone Tahsil, Khargone, Madhya Pradesh, 451001, India latitude 21
name- Mandla, Madhya Pradesh, India latitude 22.68536625 lon 80.58150561711888
name- Mandsaur, Madhya Pradesh, India latitude 24.2651306 lon 75.38718193725012
name- Morena, Madhya Pradesh, India latitude 26.166667 lon 77.5
name- Narsinghpur, Narsimhapur Tahsil, Narsimhapur, Madhya Pradesh, 487001, India la
name- Neemuch, Madhya Pradesh, India latitude 24.63044655 lon 75.18339614635457
name- Niwari, Madhya Pradesh, India latitude 25.312470400000002 lon 78.6678501692498
name- Panna, Madhya Pradesh, India latitude 24.5 lon 80.25
name- Raisen, Madhya Pradesh, India latitude 23.25 lon 78.083333
name- Rajgarh, Madhya Pradesh, India latitude 23.87167135 lon 76.7748902040889
name- Ratlam, Madhya Pradesh, India latitude 23.501957750000003 lon 74.9528451868009
name- Rewa, Madhya Pradesh, India latitude 24.75926685 lon 81.65500021078341
name- Sagar, Madhya Pradesh, India latitude 23.80961225 lon 78.75911360578634
name- Satna, Madhya Pradesh, India latitude 24.5 lon 81.0
name- Sehore, Madhya Pradesh, India latitude 23.1156882 lon 77.06623939176504
name- Seoni, Madhya Pradesh, India latitude 22.275878900000002 lon 79.721044651047
name- Shahdol, Sohagpur Tahsil, Shahdol, Madhya Pradesh, 484001, India latitude 23.3
name- Shajapur, Madhya Pradesh, India latitude 23.37074105 lon 76.62051527475785
name- Sheopur, Sheopur Tahsil, Sheopur, Madhya Pradesh, 476337, India latitude 25.66
name- Shivpuri, Madhya Pradesh, India latitude 25.37524125 lon 77.82811932629714
name- Sidhi, Madhya Pradesh, India latitude 24.25 lon 82.0
name- Singrauli, Singrauli Tahsil, Singrauli, Madhya Pradesh, 486889, India latitude
name- Tikamgarh, Madhya Pradesh, India latitude 24.85450275 lon 79.04698123882801
name- Ujjain, Ujjain Tahsil, Ujjain, Madhya Pradesh, 456001, India latitude 23.17459
name- Umaria, Madhya Pradesh, India latitude 23.64319305 lon 80.94239522009255
name- Vidisha, Madhya Pradesh, 464221, India latitude 23.916667 lon 78.0
```

```
for i in Mizoram_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Mizoram_s.remove(i)
print(Mizoram_s)
lat_Mizoram_s=[]
lon_Mizoram_s=[]
for i in Mizoram_s:
```

```
    n=nom.geocode(i)
    if n is not None:
      lat_Mizoram_s.append(n.latitude)
      lon_Mizoram_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Mizoram_s.append(0)
      lon_Mizoram_s.append(0)
```

```
['Aizawl', 'Champhai', 'Hnahthial', 'Khawzawl', 'Kolasib', 'Lawngtlai', 'Lunglei', '
name- Aizawl, Tlangnuam, Aizwal, Mizoram, 796190, India latitude 23.7414092 lon 92.7
name- Champhai, Mizoram, 796321, India latitude 23.69082385 lon 93.34839119913778
name- Hnahthial, Lunglei, Mizoram, India latitude 22.9663656 lon 93.01026448504744
name- Khawzawl, Champhai, Mizoram, 796310, India latitude 23.53892045 lon 93.1586839
name- Kolasib, Mizoram, India latitude 24.18947525 lon 92.7133181281124
name- Lawngtlai, Mizoram, 796891, India latitude 22.34596495 lon 92.8119536068969
name- Lunglei, Mizoram, India latitude 22.898553 lon 92.75192291719874
name- Mamit, Mizoram, India latitude 23.75590845 lon 92.45173568830637
name- Saiha, Mizoram, 796901, India latitude 22.4995518 lon 92.97798988717027
name- Sachal, Thingsulthliah, Aizwal, Mizoram, India latitude 23.6929995 lon 92.9654
name- Serchhip, Mizoram, 796181, India latitude 23.385892300000002 lon 92.9305989081
```

```
for i in Odisha_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Odisha_s.remove(i)
#print(Odisha_s)
lat_Odisha_s=[]
lon_Odisha_s=[]
for i in Odisha_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Odisha_s.append(n.latitude)
      lon_Odisha_s.append(n.longitude)
      #print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Odisha_s.append(0)
      lon_Odisha_s.append(0)

print(len(Odisha_s))
print(len(lat_Odisha_s))
```

```
30
30
```

```
for i in Punjab_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Punjab_s.remove(i)
print(Punjab_s)
lat_Punjab_s=[]
lon_Punjab_s=[]
for i in Punjab_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Punjab_s.append(n.latitude)
      lon_Punjab_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
```

```
      print("name- ",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Punjab_s.append(0)
      lon_Punjab_s.append(0)
```

```
['Amritsar', 'Barnala', 'Bathinda', 'Faridkot', 'Fatehgarh Sahib', 'Fazilka', 'Feroz
name- Amritsar, Amritsar I Tahsil, Amritsar, Punjab, 143001, India latitude 31.63430
name- Barnala, Punjab, India latitude 30.3704685 lon 75.504017418548
name- Bathinda, Punjab, India latitude 30.17911535 lon 75.04710156312628
name- Faridkot, Punjab, India latitude 30.60092505 lon 74.79477422840449
name- Fategarh Sahib, Punjab, India latitude 30.6600764 lon 76.38002163710028
name- Fazilka, Punjab, India latitude 30.336099599999997 lon 74.11794319222481
name- Ferozepur, Fatehgarh Sahib Tahsil, Fategarh Sahib, Punjab, 140407, India latit
name- Gurdaspur, Punjab, India latitude 31.904229899999997 lon 75.22738141098935
name- Hoshiarpur, Punjab, India latitude 31.60857425 lon 75.84644246890946
name- Jalandhar, Punjab, India latitude 31.29201065 lon 75.56805772253911
name- Kapurthala, Punjab, India latitude 31.38524095 lon 75.30552273989395
name- Ludhiana, Ludhiana (West) Tahsil, Ludhiana, Punjab, 141001, India latitude 30.
name- Mansa, Punjab, India latitude 29.8769971 lon 75.4889866137018
name- Moga, Punjab, India latitude 30.7839866 lon 75.16057422541162
name- Pathankot, Punjab, India latitude 32.301710400000005 lon 75.65864246622084
name- Patiala, Punjab, India latitude 30.2090874 lon 76.3398720856221
name- Rupnagar, Punjab, India latitude 31.09168085 lon 76.5272673916138
name- STREET NO.3/8, S.A.S. NAGAR, Gurudev Nagar, Ludhiana, Ludhiana (West) Tahsil,
name- Sangrur, Punjab, India latitude 30.2093363 lon 75.8184224340909
name- Sri Muktsar Sahib, Muktsar Tahsil, Muktsar, Punjab, 152026, India latitude 30.
name- Tarn Taran, Punjab, India latitude 31.32124525 lon 74.84130629340785
```

```
for i in Puducherry_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Puducherry_s.remove(i)
print(Puducherry_s)
lat_Puducherry_s=[]
lon_Puducherry_s=[]
for i in Puducherry_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Puducherry_s.append(n.latitude)
      lon_Puducherry_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Puducherry_s.append(0)
      lon_Puducherry_s.append(0)
```

```
['Karaikal', 'Mahe', 'Puducherry', 'Yanam']
name- Karaikal, Karaikal Taluk, Karaikal, Puducherry, India latitude 10.91571 lon 79
name- Mahé, Victoria, Mahé, Seychelles latitude -4.68379555 lon 55.49263800753758
name- Puducherry, Puducherry Taluk, Puducherry district, Puducherry, 605001, India l
name- Yanam, Yanam Taluk, Yanam District, Puducherry, 533464, India latitude 16.7333
```

```
for i in Rajasthan_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Rajasthan_s.remove(i)
print(Rajasthan_s)
lat_Rajasthan_s=[]
lon_Rajasthan_s=[]
for i in Rajasthan_s:
```

```
for i in Rajasthan_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Rajasthan_s.append(n.latitude)
      lon_Rajasthan_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Rajasthan_s.append(0)
      lon_Rajasthan_s.append(0)
```

```
['Ajmer', 'Alwar', 'Banswara', 'Baran', 'Barmer', 'Bharatpur', 'Bhilwara', 'Bikaner'
name- Ajmer, Ajmer Tehsil, Ajmer, Rajasthan, India latitude 26.4691 lon 74.639
name- Alwar, Rajasthan, India latitude 27.639077049999997 lon 76.6144524902045
name- Banswara, Rajasthan, India latitude 23.4930788 lon 74.34840231310622
name- Baran, Rajasthan, India latitude 24.9171512 lon 76.69640322489136
name- Barmer, Rajasthan, India latitude 25.5819034 lon 71.61966242777196
name- Bharatpur, Rajasthan, India latitude 27.26521245 lon 77.36912554739122
name- Bhilwara, Rajasthan, India latitude 25.48877345 lon 74.69961283584024
name- Bikaner, Bikaner Tehsil, Bikaner, Rajasthan, 334001, India latitude 28.0159286
name- BSF Camp, Bhuj, Bhuj Taluka, Kutch District, Gujarat, 370001, India latitude 2
name- Būndi, Bundi, Rajasthan, India latitude 25.5 lon 75.833333
name- Chittorgarh, Rajasthan, India latitude 24.718026000000002 lon 74.4721469720087
name- Churu, Rajasthan, India latitude 28.2061443 lon 74.69190729963461
name- Dausa, Rajasthan, India latitude 26.80486585 lon 76.44374569929329
name- Dhaulpur, Dhaulpur Tehsil, Dhaulpur, Rajasthan, 328001, India latitude 26.7009
name- Dūngarpur, Dungarpur, Rajasthan, India latitude 23.666667 lon 73.75
name- Bristol Evacuees, Newgate, Temple, Broadmead, Bristol, City of Bristol, South
name- Ganganagar, Dhalai, Tripura, India latitude 23.7497214 lon 91.87663495294915
name- Hanumangarh, Rajasthan, India latitude 29.367200150000002 lon 74.2983636506590
name- Italian's, Rodovia Governador Leonel de Moura Brizola, Botucaray, Sede, Soleda
name- Jaipur, Jaipur Tehsil, Jaipur, Rajasthan, 302001, India latitude 26.916194 lon
name- Jaisalmer, Rajasthan, India latitude 27.02801615 lon 70.7785056232077
name- Jalore, Jalor Tehsil, Jalor, Rajasthan, 343001, India latitude 25.3476006 lon
name- Jhalawar, Rajasthan, India latitude 24.3132368 lon 76.52223626123003
name- Jhunjhunu, Jhunjhunun Tehsil, Jhunjhunun, Rajasthan, 333001, India latitude 28
name- Jodhpur, Jodhpur Tehsil, Jodhpur District, Rajasthan, India latitude 26.296771
name- Karauli, Rajasthan, India latitude 26.51668105 lon 77.05772976517363
name- Kota, Rajasthan, India latitude 25.1968256 lon 76.00089330885552
name- Nagaur, Rajasthan, India latitude 27.0607859 lon 74.17667537582712
name- Pali, Rajasthan, India latitude 25.6040908 lon 73.41560878556902
name- Pratāpgarh, Pratapgarh, Uttar Pradesh, India latitude 25.75 lon 81.75
name- Rajsamand, Rajasthan, India latitude 25.29131615 lon 73.8244924740361
name- Sawai Madhopur, Rajasthan, India latitude 26.22914115 lon 76.30453277017932
name- Sikar, Rajasthan, India latitude 27.662826000000003 lon 75.02792628691331
name- Sirohi, Rajasthan, India latitude 24.811404699999997 lon 72.83002573160249
name- Tonk, Rajasthan, India latitude 26.12214725 lon 75.66375373932236
name- Udaipur, Bhatiyani Chotta, Udaipur Police Lines, Udaipur, Girwa Tehsil, Udaipu
```

```
for i in Sikkim_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Sikkim_s.remove(i)
print(Sikkim_s)
lat_Sikkim_s=[]
lon_Sikkim_s=[]
for i in Sikkim_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Sikkim_s.append(n.latitude)
```

```
      lon_Sikkim_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Sikkim_s.append(0)
      lon_Sikkim_s.append(0)
```

```
['East Sikkim', 'North Sikkim', 'South Sikkim', 'West Sikkim']
name- Sikkim, India latitude 27.601029 lon 88.45413638680145
name- Sikkim, India latitude 27.601029 lon 88.45413638680145
name- Sikkim, India latitude 27.601029 lon 88.45413638680145
name- Sikkim, India latitude 27.601029 lon 88.45413638680145
```

```
for i in Telangana_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Telangana_s.remove(i)
for i in Telangana_s:
    if(i=="Other State"):
      Telangana_s.remove(i)
print(Telangana_s)
lat_Telangana_s=[]
lon_Telangana_s=[]
for i in Telangana_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Telangana_s.append(n.latitude)
      lon_Telangana_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Telangana_s.append(0)
      lon_Telangana_s.append(0)
```

```
['Adilabad', 'Bhadradri Kothagudem', 'Hyderabad', 'Jagtial', 'Jangaon', 'Jayashankar
name- Adilabad, Telangana, India latitude 19.5 lon 78.5
name- Bhadradri Kothagudem, Telangana, India latitude 17.71534525 lon 80.57149761778
name- Hyderabad, Telangana, India latitude 17.38878595 lon 78.46106473453146
name- Jagtial, Telangana, India latitude 18.82135895 lon 78.91506632525903
name- Jangaon, Telangana, India latitude 17.7265463 lon 79.25901524867399
name- Jayashankar Bhupalapally, Telangana, India latitude 18.515987199999998 lon 79.
name- Jogulamba Gadwal, Telangana, India latitude 16.0999202 lon 77.73415835077523
```

```
for i in Tamil_Nadu_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Tamil_Nadu_s.remove(i)
for i in Tamil_Nadu_s:
    if(i=="Airport Quarantine"):
     Tamil_Nadu_s.remove(i)
print(Tamil_Nadu_s)
lat_Tamil_Nadu_s=[]
lon_Tamil_Nadu_s=[]
for i in Tamil_Nadu_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Tamil_Nadu_s.append(n.latitude)
      lon_Tamil_Nadu_s.append(n.longitude)
      #print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Tamil_Nadu_s.append(0)
      lon_Tamil_Nadu_s.append(0)
print(lat_Tamil_Nadu_s)
```

```
['Ariyalur', 'Chengalpattu', 'Chennai', 'Coimbatore', 'Cuddalore', 'Dharmapuri', 'Di
[11.076035950000001, 12.76657415, 13.0801721, 11.0018115, 11.74269375, 12.09680475,
```

```
for i in Tripura_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Tripura_s.remove(i)
print(Tripura_s)
lat_Tripura_s=[]
lon_Tripura_s=[]
for i in Tripura_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Tripura_s.append(n.latitude)
      lon_Tripura_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Tripura_s.append(0)
      lon_Tripura_s.append(0)
```

```
['Dhalai', 'Gomati', 'Khowai', 'North Tripura', 'Sipahijala', 'South Tripura', 'Unok
```

```
for i in Uttar_Pradesh_s:
     if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Uttar_Pradesh_s.remove(i)
print(Uttar_Pradesh_s)
lat_Uttar_Pradesh_s=[]
lon_Uttar_Pradesh_s=[]
for i in Uttar_Pradesh_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Uttar_Pradesh_s.append(n.latitude)
      lon_Uttar_Pradesh_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Uttar_Pradesh_s.append(0)
      lon_Uttar_Pradesh_s.append(0)
```

```
['Agra', 'Aligarh', 'Ambedkar Nagar', 'Amethi', 'Amroha', 'Auraiya', 'Ayodhya', 'Aza
name- Agra, Uttar Pradesh, 280001, India latitude 27.1752554 lon 78.0098161
name- Aligarh, Uttar Pradesh, India latitude 27.87698975 lon 78.13729027600994
name- Ambedkar Nagar, Uttar Pradesh, India latitude 26.40349795 lon 82.6072814867612
name- Amethi, Uttar Pradesh, India latitude 26.34738315 lon 81.6238783207884
name- Amroha, Jyotiba Phule Nagar, Uttar Pradesh, India latitude 28.9233969 lon 78.4
name- Auraiya, Uttar Pradesh, India latitude 26.65573395 lon 79.51504701181831
name- Ayodhya, Faizabad, Uttar Pradesh, 224123, India latitude 26.7990707 lon 82.205
name- Azamgarh, Uttar Pradesh, India latitude 26.02269675 lon 83.02887343114848
name- Baghpat, Uttar Pradesh, 250609, India latitude 28.97240405 lon 77.333152849382
name- Bahraich, Uttar Pradesh, India latitude 27.7336958 lon 81.47732127661058
name- Ballia, Uttar Pradesh, India latitude 25.877932549999997 lon 84.11995931460379
name- Balrampur, Uttar Pradesh, India latitude 27.4504805 lon 82.39541774073132
name- Buenos Aires, Argentina latitude -36.3789925 lon -60.3855889
name- Barabanki, Uttar Pradesh, India latitude 26.93823105 lon 81.38609761204991
name- Bareilly, Uttar Pradesh, India latitude 28.457876 lon 79.40557093743058
name- Basti, Siddharth Nagar, Uttar Pradesh, India latitude 27.25 lon 83.0
name- Bhadohi, Sant Ravidas Nagar, Uttar Pradesh, India latitude 25.422922749999998
name- Bijnor, Uttar Pradesh, India latitude 29.40604895 lon 78.48087839917878
name- Budaun, Uttar Pradesh, India latitude 28.06831165 lon 79.04607312079293
name- Bulandshahr, Uttar Pradesh, India latitude 28.38886085 lon 77.97479772598118
name- Chandauli, Uttar Pradesh, India latitude 25.1265777 lon 83.2496557733391
name- Chitrakoot, Uttar Pradesh, India latitude 25.2195207 lon 81.102282425
name- Deoria, Uttar Pradesh, India latitude 26.42384715 lon 83.76273169028727
name- Etah, Uttar Pradesh, India latitude 27.5541146 lon 78.60078640304634
name- Etawah, Uttar Pradesh, India latitude 26.718324350000003 lon 79.09025375025163
name- Farrukhabad, Uttar Pradesh, India latitude 27.43719385 lon 79.48912946503123
name- Fatehpur, Uttar Pradesh, India latitude 25.8435395 lon 80.91800397088501
name- Firozabad, Uttar Pradesh, India latitude 27.17736635 lon 78.38991197951182
name- Gautam Buddha Nagar, Uttar Pradesh, India latitude 28.36760975 lon 77.59740326
name- Ghaziabad, Uttar Pradesh, India latitude 28.711241 lon 77.4445372
name- Ghazipur, Uttar Pradesh, India latitude 25.603508400000003 lon 83.507454048871
name- Gonda, Uttar Pradesh, India latitude 27.1096669 lon 81.9183291218813
name- Gorakhpur, Uttar Pradesh, India latitude 26.67132865 lon 83.36458284227038
```

```
for i in Uttarakhand_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Uttarakhand_s.remove(i)
print(Uttarakhand_s)
lat_Uttarakhand_s=[]
lon_Uttarakhand_s=[]
for i in Uttarakhand_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Uttarakhand_s.append(n.latitude)
      lon_Uttarakhand_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Uttarakhand_s.append(0)
      lon_Uttarakhand_s.append(0)
```

```
['Almora', 'Bageshwar', 'Chamoli', 'Champawat', 'Dehradun', 'Haridwar', 'Nainital',
name- Almora, Uttarakhand, India latitude 29.703094999999998 lon 79.43317023326716
name- Bageshwar, Uttarakhand, India latitude 30.0086722 lon 79.9302967950447
name- Chamoli, Uttarakhand, India latitude 30.499632300000002 lon 79.61879245944404
name- Champawat, Uttarakhand, India latitude 29.23631315 lon 80.10172076512075
name- Dehradun, Rajpur-Mussoorie Road, Dehradun, Uttarakhand, 248001, India latitude
name- Haridwār, Hardwar, Haridwar, Uttarakhand, 249401, India latitude 29.9384473 lo
```

```
for i in West_Bengal_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     West_Bengal_s.remove(i)
print(West_Bengal_s)
lat_West_Bengal_s=[]
lon_West_Bengal_s=[]
for i in West_Bengal_s:
    n=nom.geocode(i)
    if n is not None:
      lat_West_Bengal_s.append(n.latitude)
      lon_West_Bengal_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_West_Bengal_s.append(0)
      lon_West_Bengal_s.append(0)
```

```
['Alipurduar', 'Bankura', 'Birbhum', 'Cooch Behar', 'Dakshin Dinajpur', 'Darjeeling'
name- Alipurduar, Alipurduar - I, Alipurduar, West Bengal, 736121, India latitude 26
name- Bankura, West Bengal, India latitude 23.13195425 lon 87.20739720367507
name- Bīrbhūm, Birbhum, West Bengal, India latitude 24.0 lon 87.583333
name- Koch Bihar, Cooch Behar - I, Kochbihar, West Bengal, 736101, India latitude 26
name- Dakshin Dinajpur, West Bengal, India latitude 25.38703085 lon 88.5047150499999
name- Darjeeling, Darjeeling Pulbazar, Darjeeling, West Bengal, 734101, India latitu
name- Hooghly, Grand Trunk Road, Chunchura, Chinsurah - Magra, Hugli, West Bengal, 7
name- Howrah, West Bengal, 711101, India latitude 22.5736296 lon 88.3251045
name- Jalpaiguri, West Bengal, India latitude 26.626483649999997 lon 88.734077014689
name- Jhargram, West Bengal, 721507, India latitude 22.3770636 lon 87.04867177362203
name- Kalimpong, Kalimpong -I, Kalimpong, West Bengal, 734301, India latitude 27.071
name- Kolkata, West Bengal, India latitude 22.54541245 lon 88.3567751581234
name- Malda, English Bazar, Maldah, West Bengal, 732101, India latitude 25.0057449 l
name- Murshidabad, Murshidabad Jiaganj, Murshidabad, West Bengal, 742149, India lati
name- Nadia, West Bengal, India latitude 23.48454125 lon 88.55676307470536
name- North 24 Parganas, West Bengal, India latitude 22.7182799 lon 88.6424809089851
name- Paschim Bardhaman, West Bengal, India latitude 23.64260775 lon 87.164481260683
name- Paschim Medinipur, West Bengal, India latitude 22.3599134 lon 87.4133144760087
name- Purba Bardhaman, West Bengal, India latitude 23.391717 lon 87.90621212355462
name- Purba Medinipur, West Bengal, India latitude 22.06382145 lon 87.74573460267038
name- Purulia, নড়াইল জেলা, খুলনা বিভাগ, Bangladesh latitude 23.032189 lon 89.5911025
name- South 24 Parganas, West Bengal, India latitude 22.1815262 lon 88.5378048398994
name- Uttar Dinajpur, West Bengal, India latitude 25.8707958 lon 87.96259728449391
```

```
for i in Andaman_and_Nicobar_Islands_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
     Andaman_and_Nicobar_Islands_s.remove(i)
print(Andaman_and_Nicobar_Islands_s)
lat_Andaman_and_Nicobar_Islands_s=[]
lon_Andaman_and_Nicobar_Islands_s=[]
for i in Andaman_and_Nicobar_Islands_s:
    n=nom.geocode(i)
```

```
    if n is not None:
      lat_Andaman_and_Nicobar_Islands_s.append(n.latitude)
      lon_Andaman_and_Nicobar_Islands_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Andaman_and_Nicobar_Islands_s.append(0)
      lon_Andaman_and_Nicobar_Islands_s.append(0)
```

```
['North and Middle Andaman', 'South Andaman']
name- North and Middle Andaman, Andaman and Nicobar Islands, 744210, India latitude
name- South Andaman, Andaman and Nicobar Islands, India latitude 10.7056905 lon 92.4
```

```
n=nom.geocode("chennai")
print("name-",n,"latitude",n.latitude,"lon",n.longitude)
```

```
name- சென்னை - Chennai, Chennai district, Tamil Nadu, India latitude 13.0801721
```

```
for i in Andhra_Pradesh_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Andhra_Pradesh_s.remove(i)
print(Andhra_Pradesh_s)
lat_Andhra_Pradesh_s=[]
lon_Andhra_Pradesh_s=[]
for i in Andhra_Pradesh_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Andhra_Pradesh_s.append(n.latitude)
      lon_Andhra_Pradesh_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Andhra_Pradesh_s.append(0)
      lon_Andhra_Pradesh_s.append(0)
```

```
['Anantapur', 'Chittoor', 'East Godavari', 'Guntur', 'Krishna', 'Kurnool', 'Prakasam
name- Anantapur, Andhra Pradesh, India latitude 14.6546235 lon 77.55625984224562
name- Chittoor, Andhra Pradesh, 517001, India latitude 13.1601048 lon 79.15555061803
name- East Godavari, Andhra Pradesh, India latitude 17.233496 lon 81.7225986
name- Guntur, Andhra Pradesh, 522001, India latitude 16.2915189 lon 80.4541588
name- Krishna, Andhra Pradesh, India latitude 16.6691525 lon 80.7190024
name- Kurnool, Andhra Pradesh, 518001, India latitude 15.8309251 lon 78.0425373
name- Prakasam, Andhra Pradesh, India latitude 15.5 lon 79.5
name- Srikakulam, Andhra Pradesh, India latitude 18.32002205 lon 83.91607719937166
name- Visakhapatnam, Visakhapatnam (Urban), Visakhapatnam, Andhra Pradesh, 530001, I
name- Vizianagaram, Andhra Pradesh, India latitude 18.1120819 lon 83.4052196224888
name- West Godavari, Andhra Pradesh, India latitude 17.0 lon 81.166667
name- Kadapa, YSR, Andhra Pradesh, 516001, India latitude 14.4752936 lon 78.8216861
```

```
for i in Arunachal_Pradesh_s:
    if(i=="Airport Quarantine" or i=="Unknown" or i=="Other State" or i=="Foreign Evacuee
      Arunachal_Pradesh_s.remove(i)
print(Arunachal_Pradesh_s)
lat_Arunachal_Pradesh_s=[]
lon_Arunachal_Pradesh_s=[]
for i in Arunachal_Pradesh_s:
```

```
for i in Arunachal_Pradesh_s:
    n=nom.geocode(i)
    if n is not None:
      lat_Arunachal_Pradesh_s.append(n.latitude)
      lon_Arunachal_Pradesh_s.append(n.longitude)
      print("name-",n,"latitude",n.latitude,"lon",n.longitude)
    else :
      lat_Arunachal_Pradesh_s.append(0)
      lon_Arunachal_Pradesh_s.append(0)
```

```
['Anjaw', 'Changlang', 'East Kameng', 'East Siang', 'Kamle', 'Kra Daadi', 'Kurung Ku
name- Anjaw, Arunachal Pradesh, 792104, India latitude 28.1114301 lon 96.82699963398
name- Changlang, Changlang HQ, Changlang, Arunachal Pradesh, India latitude 27.13984
name- East Kameng, Arunachal Pradesh, India latitude 27.3 lon 93.05
name- East Siang, Upper Siang, Arunachal Pradesh, India latitude 28.3 lon 95.15
name- Kamle, Kankada, Raksirang, मकवानपुर, वाग्मती प्रदेश, Nepal latitude 27.629 lon 84.7
name- Kra Daadi, Arunachal Pradesh, India latitude 27.96354175 lon 93.76656538768381
name- Kurung Kumey district, Arunachal Pradesh, India latitude 27.98636765 lon 93.15
name- Lepa Rada, Arunachal Pradesh, India latitude 27.9211266 lon 94.74093620019156
name- Lohit, Arunachal Pradesh, India latitude 28.035016149999997 lon 96.17135154220
name- Longding, Arunachal Pradesh, India latitude 26.879454600000003 lon 95.31556524
name- Lower Dibang Valley, Arunachal Pradesh, India latitude 28.21495625 lon 95.8787
name- Lower Siang, Arunachal Pradesh, India latitude 27.80069825 lon 94.565023341210
name- Lower Subansiri, Kra Daadi, Arunachal Pradesh, India latitude 27.8 lon 93.6
name- Namsai, Arunachal Pradesh, 792103, India latitude 27.71403055 lon 96.015970939
name- Pakke Kessang, Arunachal Pradesh, India latitude 27.15828555 lon 93.1561502438
name- Papum Pare, Arunachal Pradesh, India latitude 27.286366649999998 lon 93.618751
name- Shi Yomi, Arunachal Pradesh, India latitude 28.68516625 lon 94.23678241115617
name- Siang, Arunachal Pradesh, 787052, India latitude 28.477491999999998 lon 94.816
name- Tawang, Tawang Circle, Tawang district, Arunachal Pradesh, 藏南, 790104, India
name- Tirap, Arunachal Pradesh, India latitude 27.03016895 lon 95.49791754505583
name- Upper Dibang Valley, Arunachal Pradesh, 792100, India latitude 28.7 lon 95.7
name- Upper Siang, Arunachal Pradesh, 791002, India latitude 28.73120455 lon 95.0377
name- Upper Subansiri, Arunachal Pradesh, India latitude 28.3 lon 94.0
name- West Kameng, West Kameng district, Arunachal Pradesh, India latitude 27.4 lon
name- West Siang, Siang, Arunachal Pradesh, India latitude 28.4 lon 94.55
```

**Maintain Orde**

# APPENDING ALL STATEWISE DISTRICT NAMES TO ONE LIST

```
finallist=[]
finallist.append(assams)
finallist.append(bihars)
finallist.append(Chandigarhs)
finallist.append(Chhattisgarhs)
finallist.append(Delhis)
finallist.append(Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s)
finallist.append(Goa_s)
finallist.append(Gujarat_s)
finallist.append(Himachal_Pradesh_s)
```

```
finallist.append(Haryana_s)
finallist.append(Jharkhand_s)
finallist.append(Jammu_and_Kashmir_s)
finallist.append(Karnataka_s)
finallist.append(Kerala_s)
finallist.append(Ladakh_s)
finallist.append(Lakshadweep_s)
finallist.append(Maharashtra_s)
finallist.append(Meghalaya_s)
finallist.append(Manipur_s)
finallist.append(Madhya_Pradesh_s)
finallist.append(Mizoram_s)
finallist.append(Nagaland_s)
finallist.append(Odisha_s)
finallist.append(Punjab_s)
finallist.append(Puducherry_s)
finallist.append(Rajasthan_s)
finallist.append(Sikkim_s)
finallist.append(Telangana_s)
finallist.append(Tamil_Nadu_s)
finallist.append(Tripura_s)
finallist.append(Uttar_Pradesh_s)
finallist.append(Uttarakhand_s)
finallist.append(West_Bengal_s)
finallist.append(Andaman_and_Nicobar_Islands_s)
finallist.append(Andhra_Pradesh_s)
finallist.append(Arunachal_Pradesh_s)

print((len(finallist)))
```

```
36
```

# *APPENDING ALL STATEWISE DISTRICT Latitude &Longitude TO ONE LIST*

```
finallistlatitude=[]
finallistlatitude.append(lat_assams)
finallistlatitude.append(lat_bihars)
finallistlatitude.append(lat_Chandigarhs)
finallistlatitude.append(lat_Chhattisgarhs)
finallistlatitude.append(lat_Delhis)
finallistlatitude.append(lat_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s)
finallistlatitude.append(lat_Goa_s)
finallistlatitude.append(lat_Gujarat_s)
finallistlatitude.append(lat_Himachal_Pradesh_s)
finallistlatitude.append(lat_Haryana_s)
finallistlatitude.append(lat_Jharkhand_s)
finallistlatitude.append(lat_Jammu_and_Kashmir_s)
finallistlatitude.append(lat_Karnataka_s)
finallistlatitude.append(lat_Kerala_s)
finallistlatitude.append(lat_Ladakh_s)
```

```
finallistlatitude.append(lat_Lakshadweep_s)
finallistlatitude.append(lat_Maharashtra_s)
finallistlatitude.append(lat_Meghalaya_s)
finallistlatitude.append(lat_Manipur_s)
finallistlatitude.append(lat_Madhya_Pradesh_s)
finallistlatitude.append(lat_Mizoram_s)
finallistlatitude.append(lat_Nagaland_s)
finallistlatitude.append(lat_Odisha_s)
finallistlatitude.append(lat_Punjab_s)
finallistlatitude.append(lat_Puducherry_s)
finallistlatitude.append(lat_Rajasthan_s)
finallistlatitude.append(lat_Sikkim_s)
finallistlatitude.append(lat_Telangana_s)
finallistlatitude.append(lat_Tamil_Nadu_s)
finallistlatitude.append(lat_Tripura_s)
finallistlatitude.append(lat_Uttar_Pradesh_s)
finallistlatitude.append(lat_Uttarakhand_s)
finallistlatitude.append(lat_West_Bengal_s)
finallistlatitude.append(lat_Andaman_and_Nicobar_Islands_s)
finallistlatitude.append(lat_Andhra_Pradesh_s)
finallistlatitude.append(lat_Arunachal_Pradesh_s)

print(((finallistlatitude)))
```

```
[[48.2232612, 26.34142215, 26.7773957, 26.4800126, 24.758639950000003, 27.06971635,
```

```
finallistlongitude=[]
finallistlongitude.append(lon_assams)
finallistlongitude.append(lon_bihars)
finallistlongitude.append(lon_Chandigarhs)
finallistlongitude.append(lon_Chhattisgarhs)
finallistlongitude.append(lon_Delhis)
finallistlongitude.append(lon_Dadra_and_Nagar_Haveli_and_Daman_and_Diu_s)
finallistlongitude.append(lon_Goa_s)
finallistlongitude.append(lon_Gujarat_s)
finallistlongitude.append(lon_Himachal_Pradesh_s)
finallistlongitude.append(lon_Haryana_s)
finallistlongitude.append(lon_Jharkhand_s)
finallistlongitude.append(lon_Jammu_and_Kashmir_s)
finallistlongitude.append(lon_Karnataka_s)
finallistlongitude.append(lon_Kerala_s)
finallistlongitude.append(lon_Ladakh_s)
finallistlongitude.append(lon_Lakshadweep_s)
finallistlongitude.append(lon_Maharashtra_s)
finallistlongitude.append(lon_Meghalaya_s)
finallistlongitude.append(lon_Manipur_s)
finallistlongitude.append(lon_Madhya_Pradesh_s)
finallistlongitude.append(lon_Mizoram_s)
finallistlongitude.append(lon_Nagaland_s)
finallistlongitude.append(lon_Odisha_s)
finallistlongitude.append(lon_Punjab_s)
```

```
finallistlongitude.append(lon_Puducherry_s)
finallistlongitude.append(lon_Rajasthan_s)
finallistlongitude.append(lon_Sikkim_s)
finallistlongitude.append(lon_Telangana_s)
finallistlongitude.append(lon_Tamil_Nadu_s)
finallistlongitude.append(lon_Tripura_s)
finallistlongitude.append(lon_Uttar_Pradesh_s)
finallistlongitude.append(lon_Uttarakhand_s)
finallistlongitude.append(lon_West_Bengal_s)
finallistlongitude.append(lon_Andaman_and_Nicobar_Islands_s)
finallistlongitude.append(lon_Andhra_Pradesh_s)
finallistlongitude.append(lon_Arunachal_Pradesh_s)
print((len(finallistlongitude)))
```

```
36
```

## *Coverting all List to 1d list*

[ ] *1 cell hidden*

## creating dataframe

[ ] *3 cells hidden*

## *APPENDING ALL CASES TO ONE LIST*

[ ] *2 cells hidden*

## Anding active ,confirmed,deceased,recovered cases to DataFrame

[ ] *1 cell hidden*

## Editing DataFrame

Manually adding lon && lat of few district to fix error caused by Geopy packages

[ ] *4 cells hidden*

## Writing Files to Google Drive

[ ] 3 cells hidden

## Plz edit the path to your Drive or create a folder covid_csv

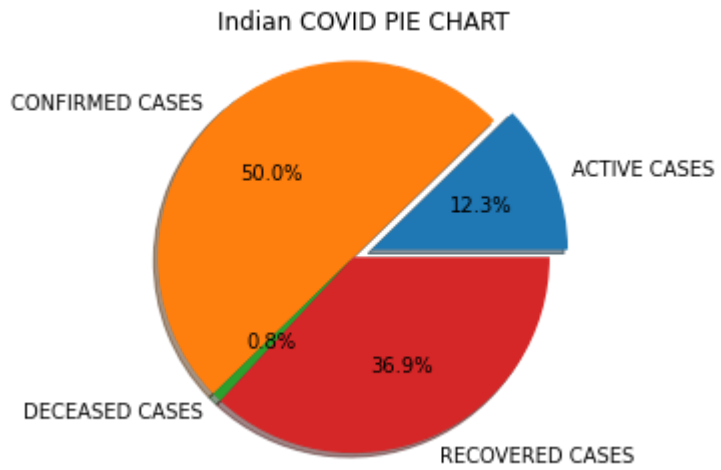
[ ] 2 cells hidden

## IMPORTING MATPLOTLIB FOR PIE CHARTS,GRAPHS

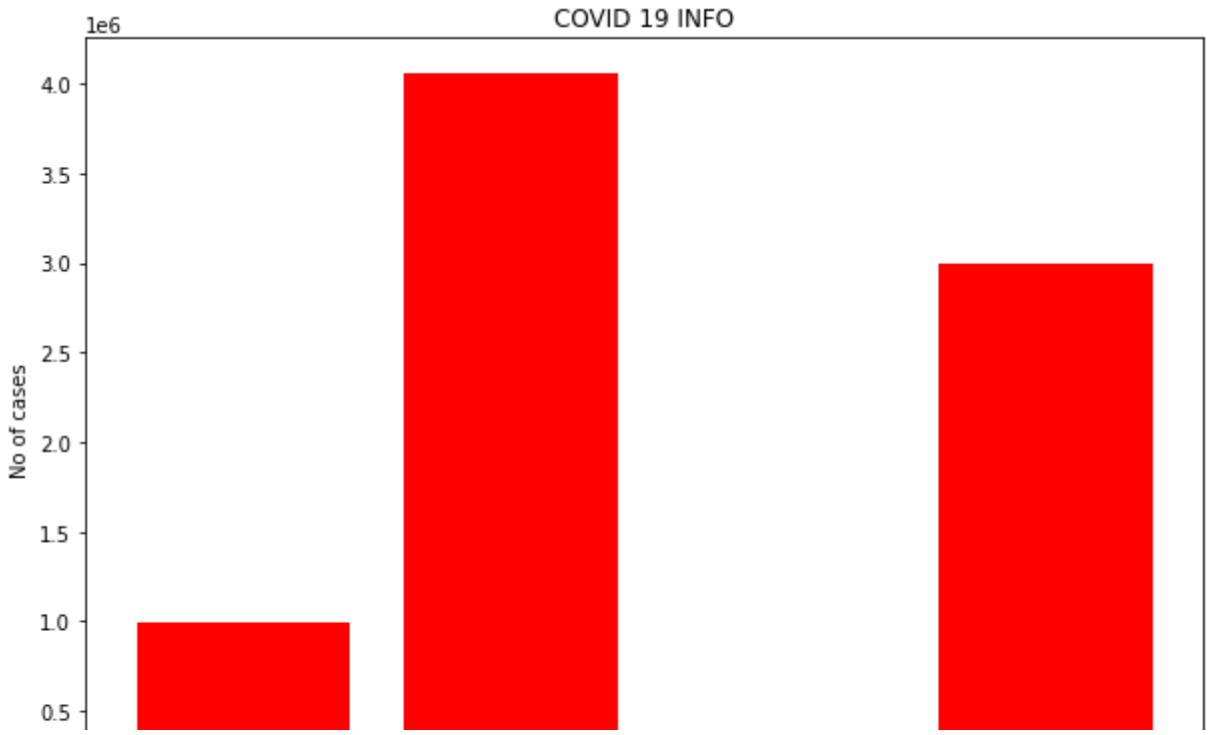
[ ] 1 cell hidden

## Ploting data for each State & Of India

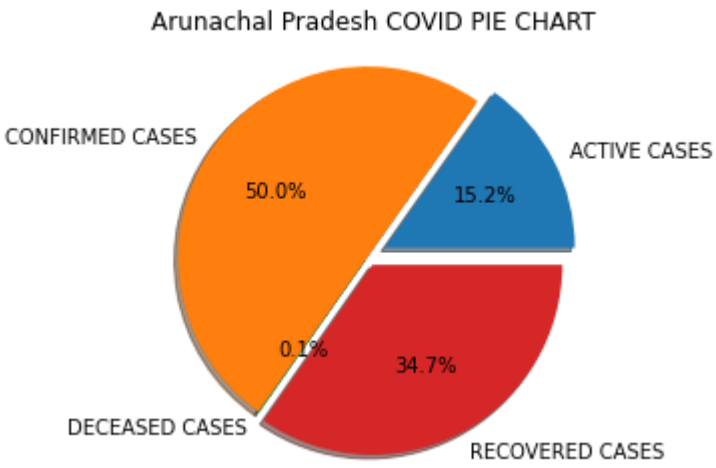
```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value1=[sum_active,sum_confirmed,sum_deceased,sum_recovered]
explode=(0.1,0,0,0)
plt.pie(value1,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Indian COVID PIE CHART")
plt.show()
```



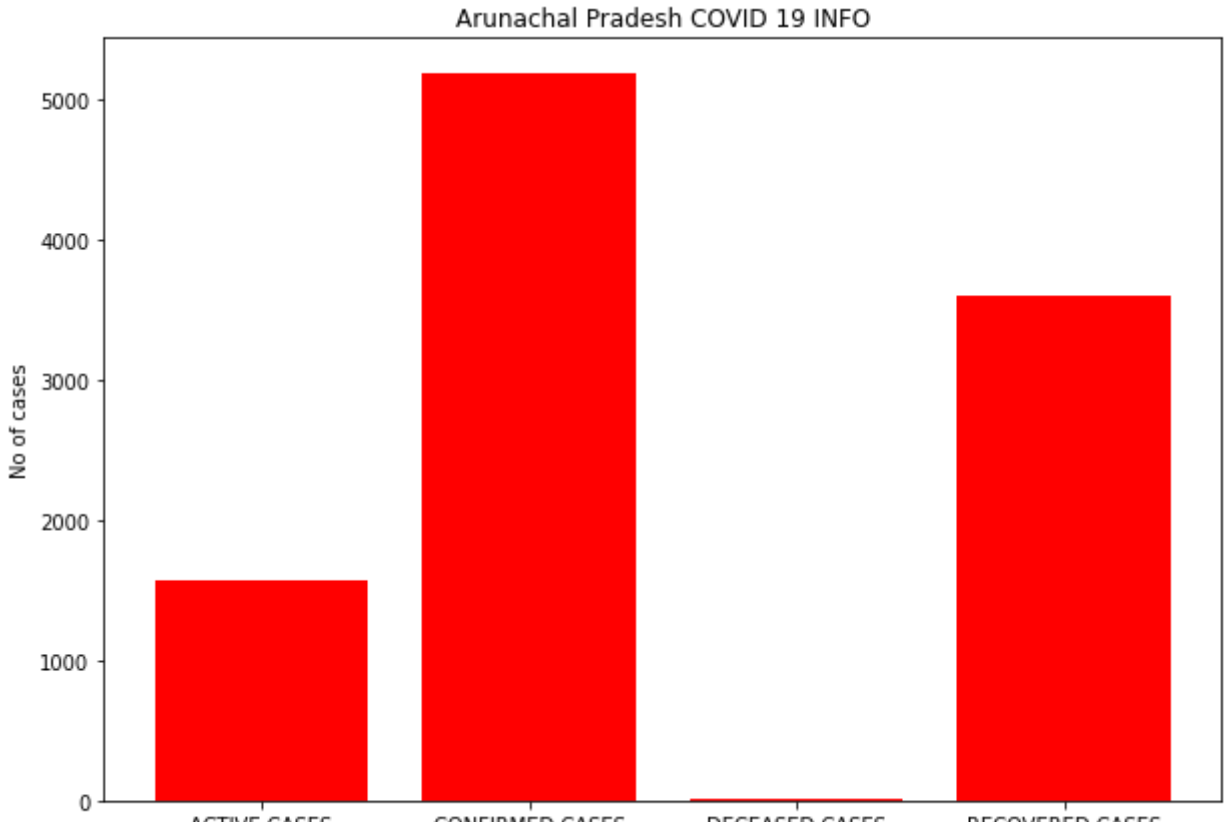

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value1,color='red')
#plt.yticks(value)
plt.xlabel("INDAIN COVID STATS")
plt.ylabel("No of cases")
plt.title("COVID 19 INFO")
plt.show()
```



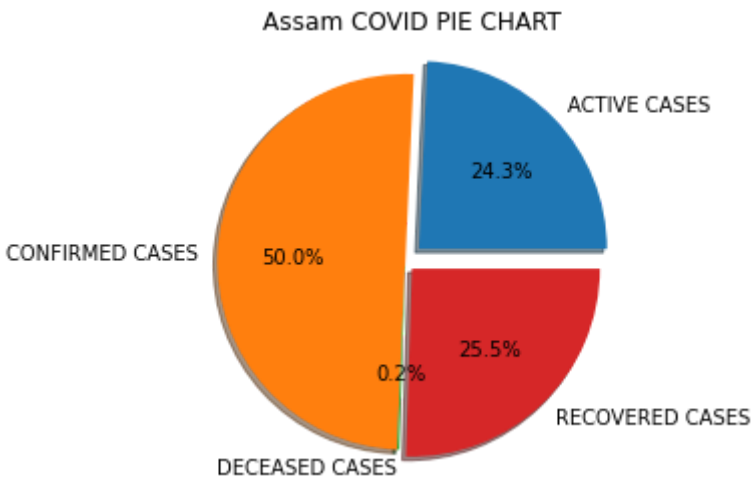

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value2=[Arunachal_Pradesh_act,Arunachal_Pradesh_con,Arunachal_Pradesh_dec,Arunachal_Prades
explode=(0.1,0,0,0.05)
plt.pie(value2,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Arunachal Pradesh COVID PIE CHART")
plt.show()
```



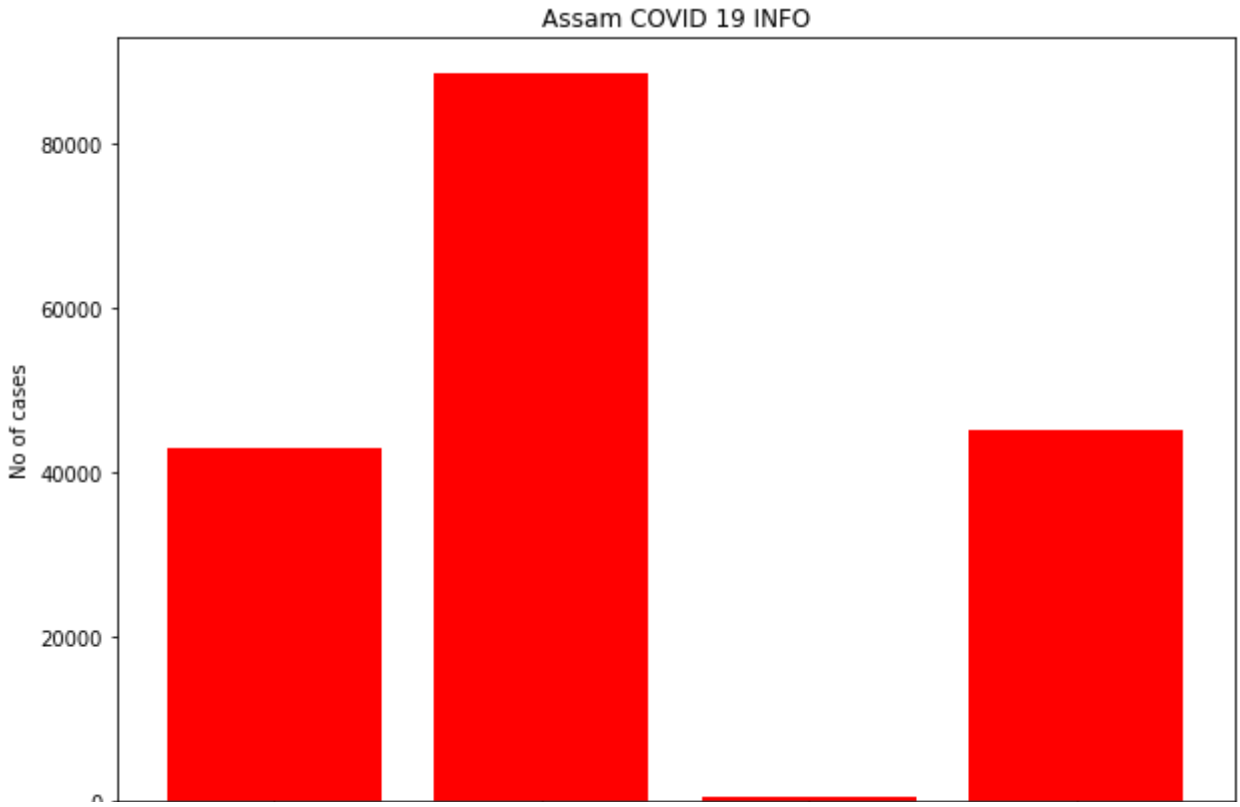

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value2,color='red')
#plt.yticks(value)
plt.xlabel("Arunachal Pradesh COVID STATS")
plt.ylabel("No of cases")
plt.title("Arunachal Pradesh COVID 19 INFO")
plt.show()
```



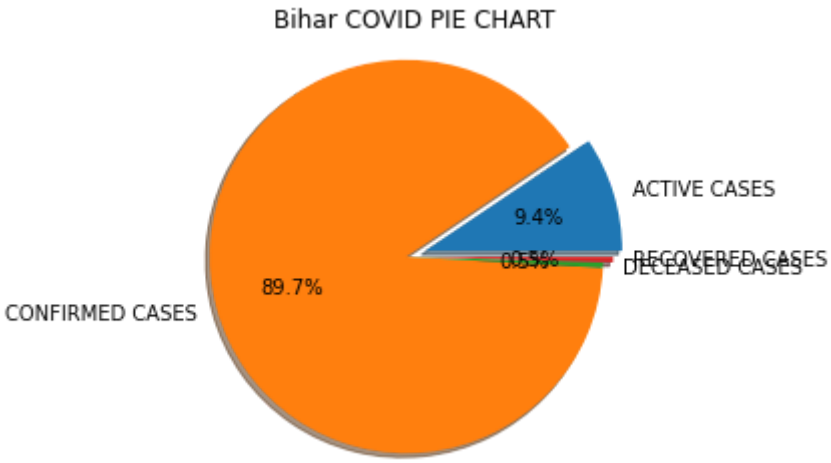

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value3=[assam_act,assam_con,assam_dec,assam_rec]
explode=(0.1,0,0,0.05)
plt.pie(value3,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Assam COVID PIE CHART")
plt.show()
```



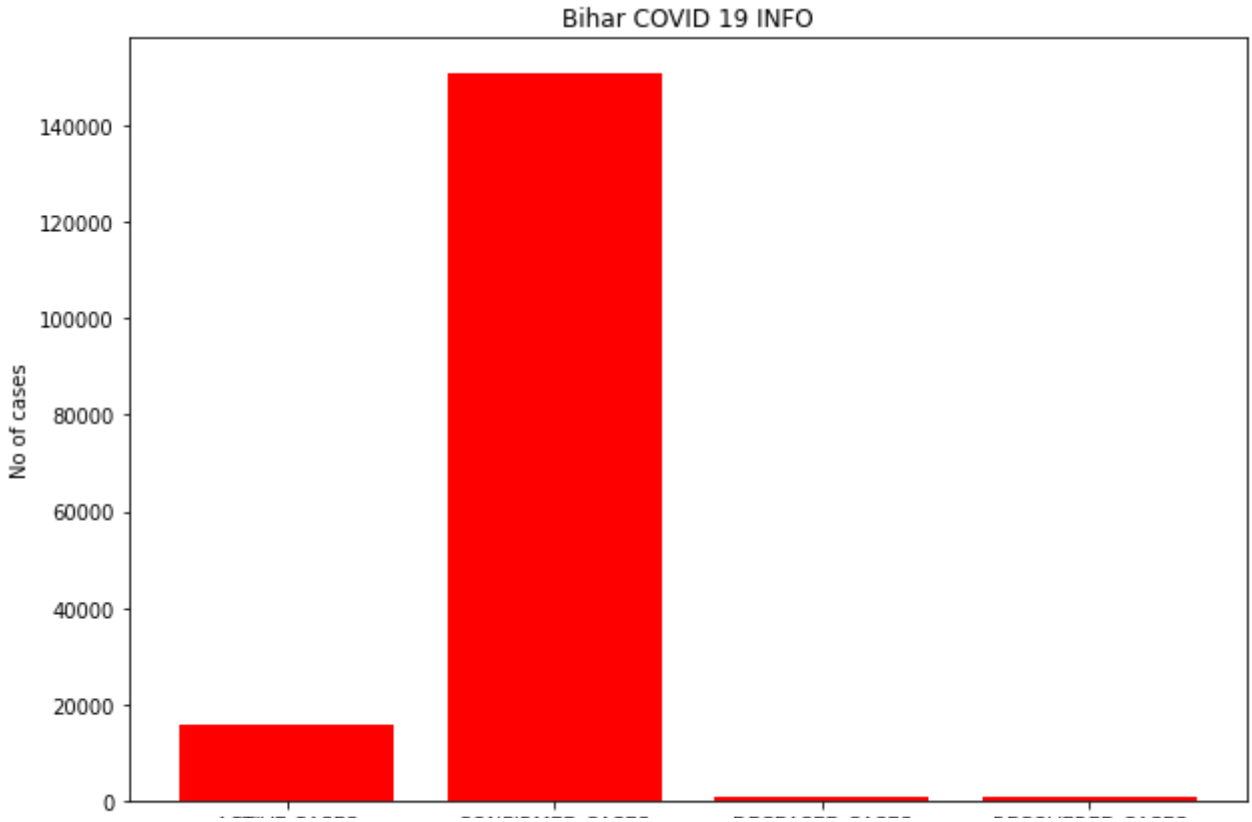

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value3,color='red')
plt.xlabel("Assam COVID STATS")
plt.ylabel("No of cases")
plt.title("Assam COVID 19 INFO")
plt.show()
```



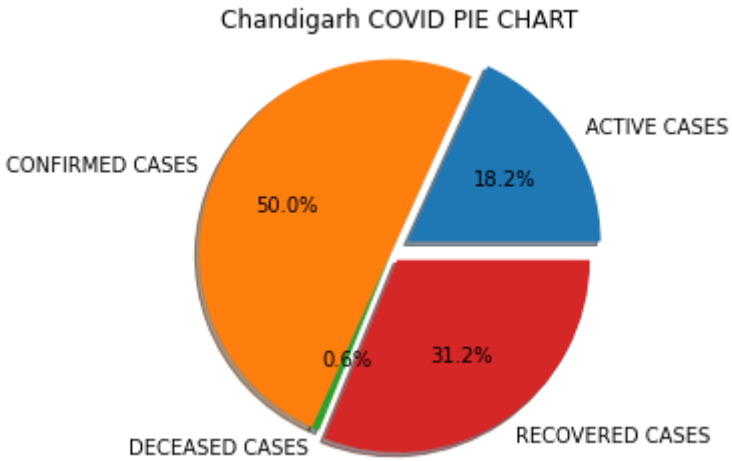

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value4=[bihar_act,bihar_con,bihar_dec,bihar_rec]
explode=(0.1,0,0,0.05)
plt.pie(value4,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Bihar COVID PIE CHART")
plt.show()
```



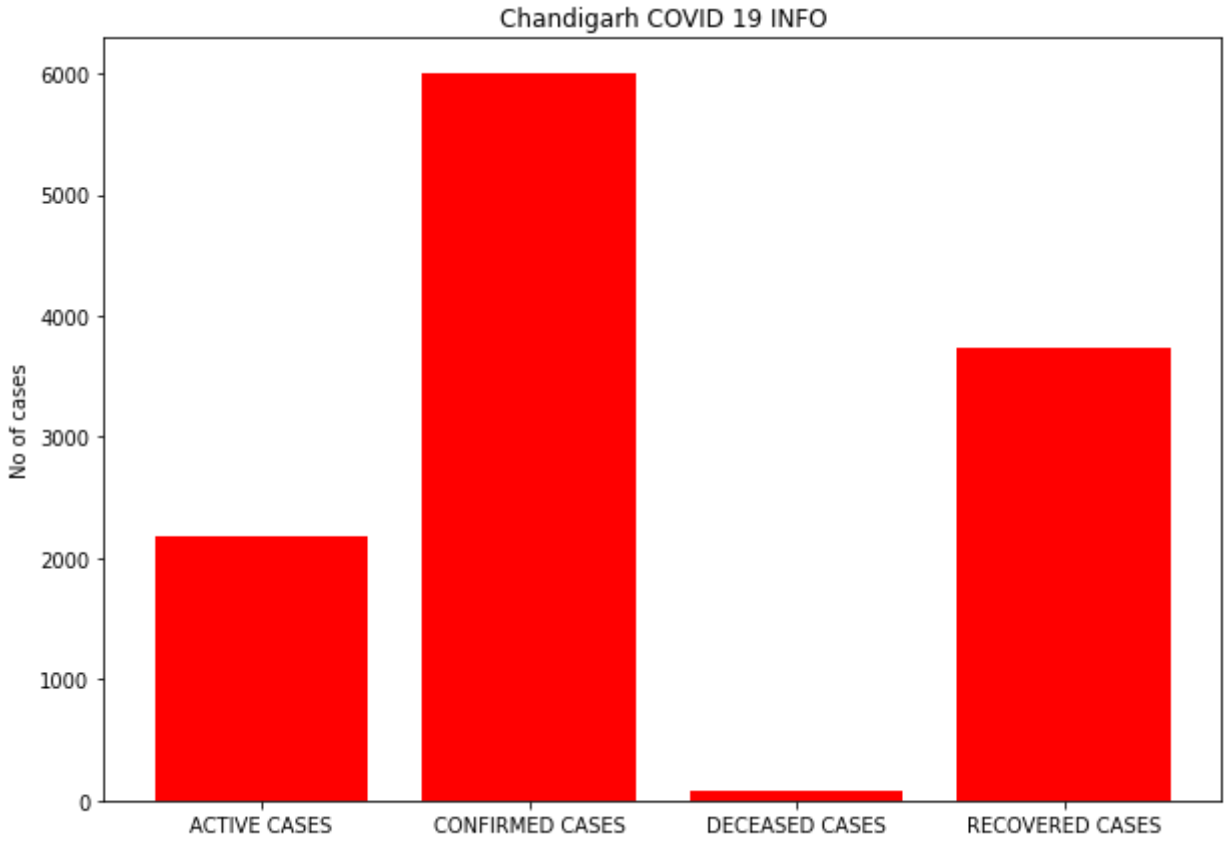

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value4,color='red')
#plt.yticks(value)
plt.xlabel("Bihar COVID STATS")
plt.ylabel("No of cases")
plt.title("Bihar COVID 19 INFO")
plt.show()
```



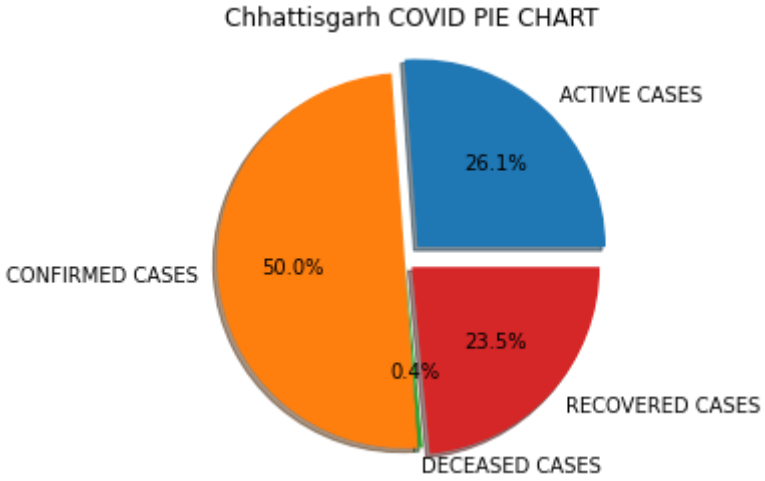

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value5=[Chandigarh_act,Chandigarh_con,Chandigarh_dec,Chandigarh_rec]
explode=(0.1,0,0,0.05)
plt.pie(value5,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Chandigarh COVID PIE CHART")
plt.show()
```



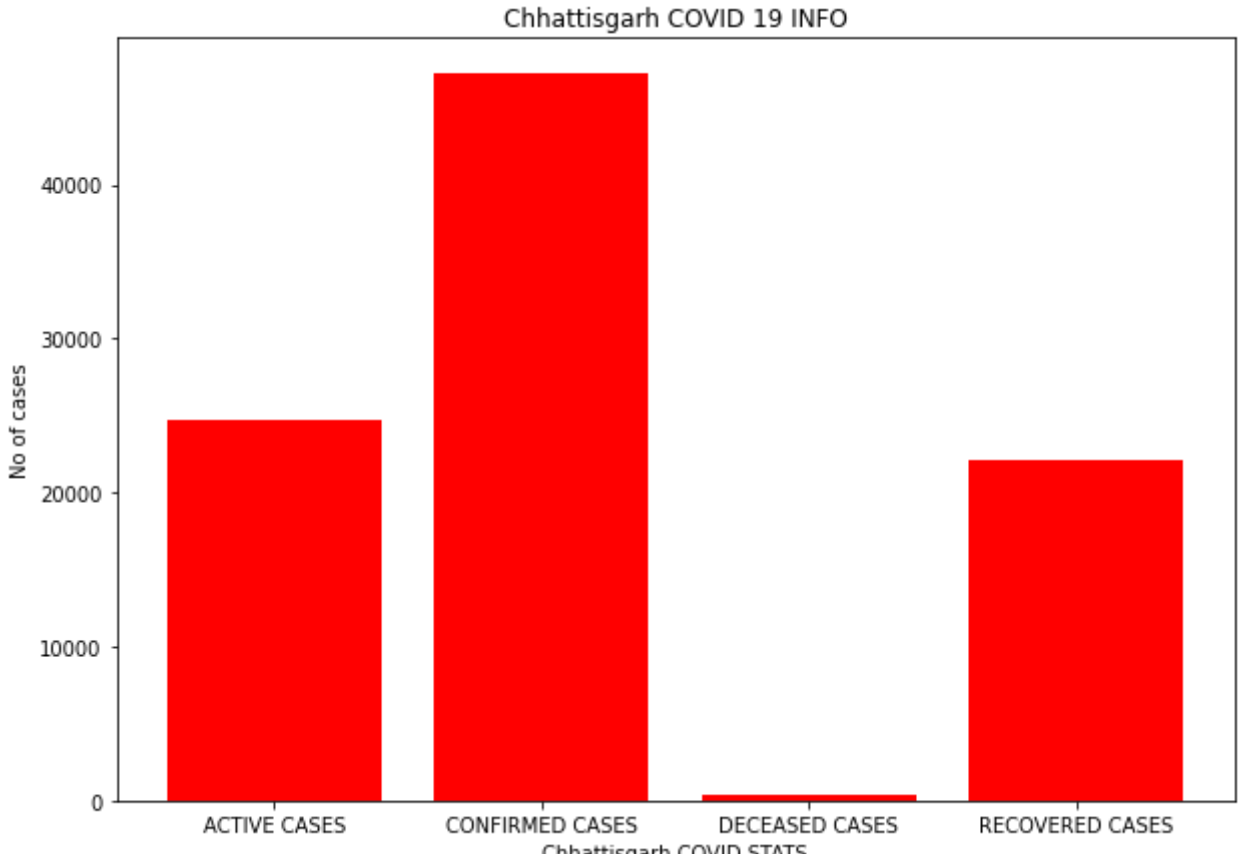

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value5,color='red')
#plt.yticks(value)
plt.xlabel("Chandigarh COVID STATS")
plt.ylabel("No of cases")
plt.title("Chandigarh COVID 19 INFO")
plt.show()
```



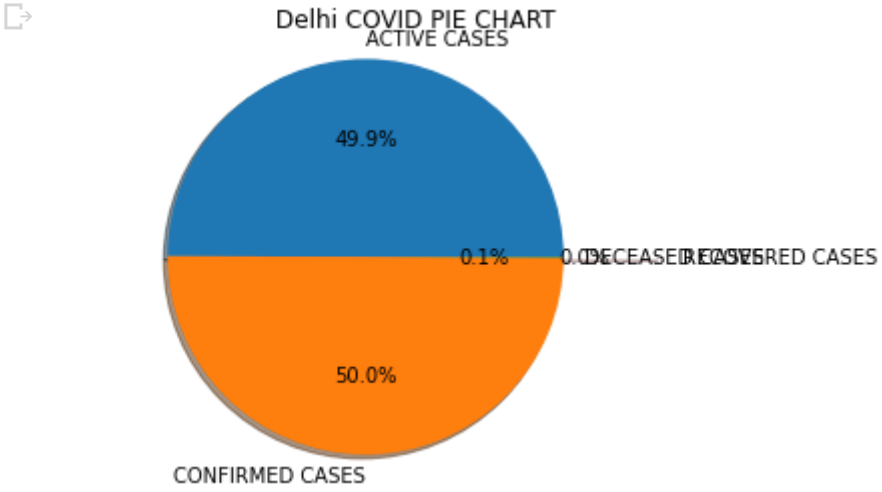

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value6=[Chhattisgarh_act,Chhattisgarh_con,Chhattisgarh_dec,Chhattisgarh_rec]
explode=(0.1,0,0,0.05)
plt.pie(value6,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Chhattisgarh COVID PIE CHART")
plt.show()
```



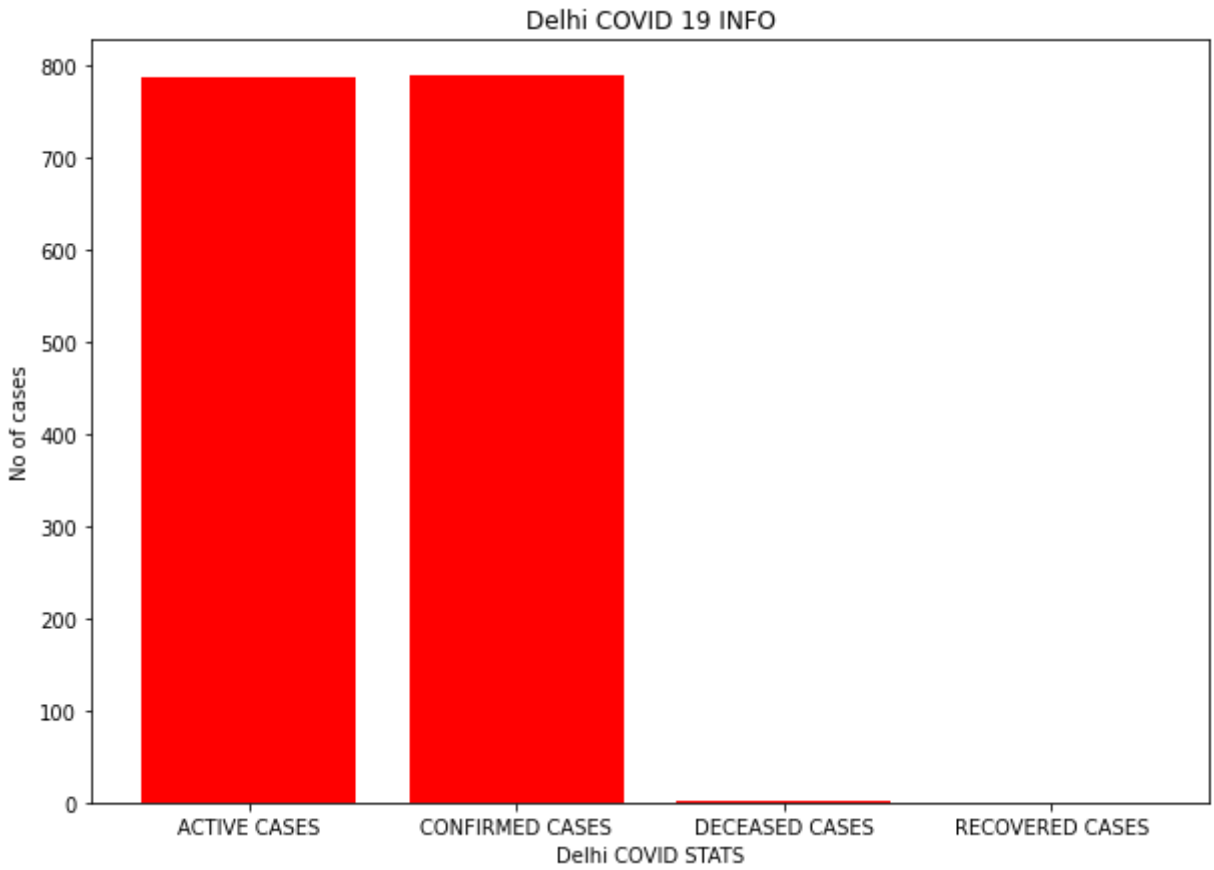

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value6,color='red')
#plt.yticks(value)
plt.xlabel("Chhattisgarh COVID STATS")
plt.ylabel("No of cases")
plt.title("Chhattisgarh COVID 19 INFO")
plt.show()
```



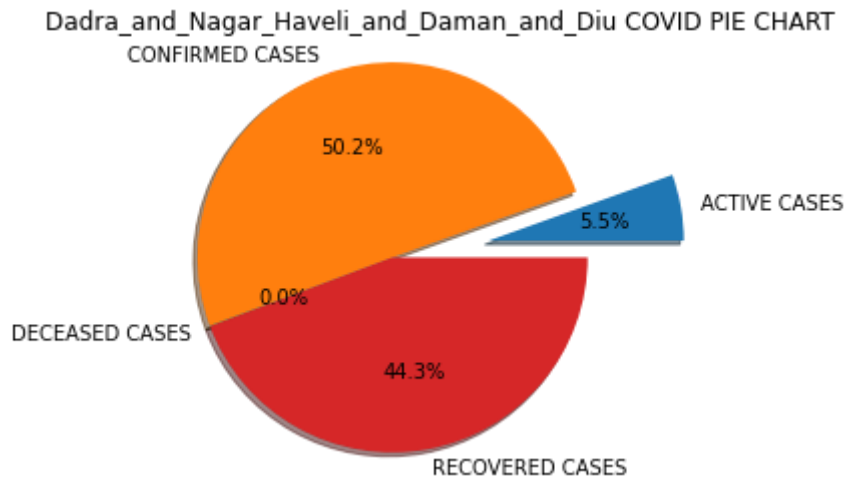

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value7=[Delhi_act,Delhi_con,Delhi_dec,Delhi_rec]
explode=(0,0,0,0.5)
plt.pie(value7,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Delhi COVID PIE CHART")
plt.show()
```



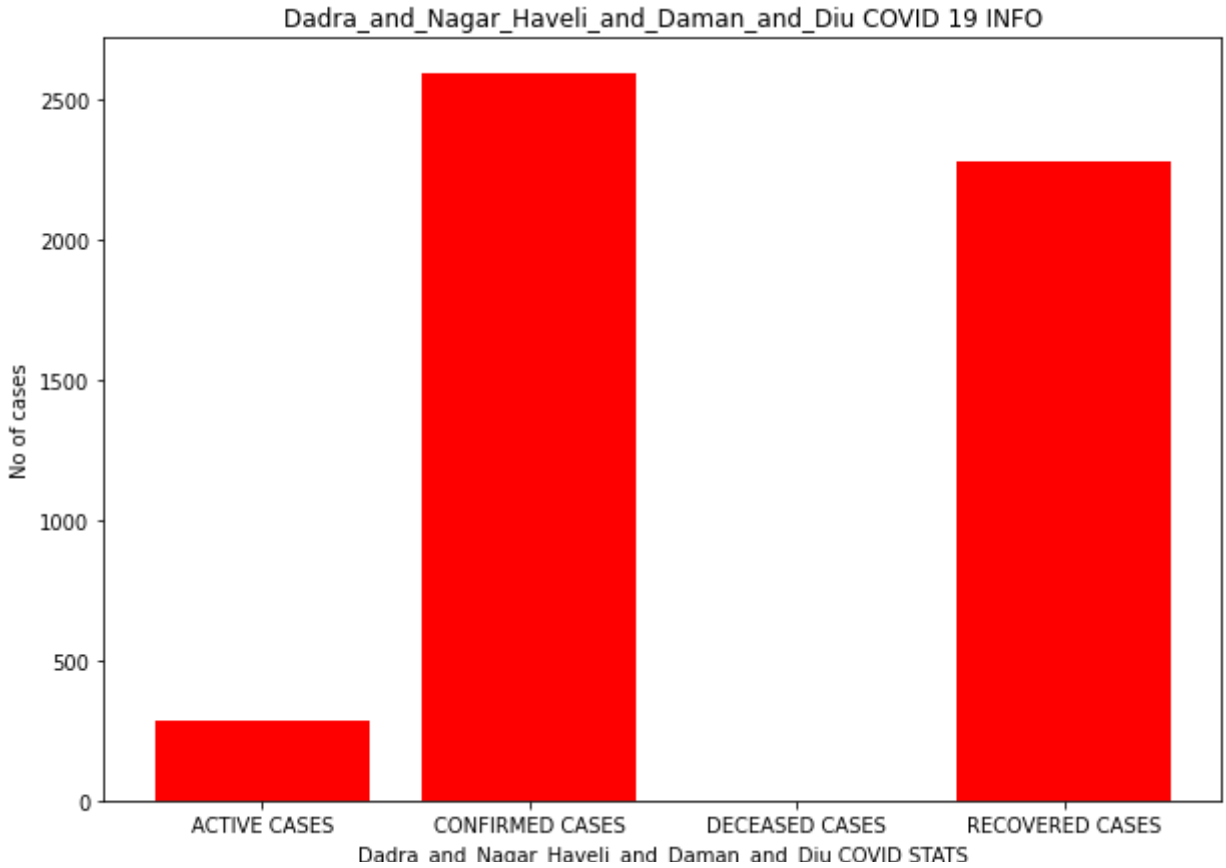

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value7,color='red')
#plt.yticks(value)
plt.xlabel("Delhi COVID STATS")
plt.ylabel("No of cases")
plt.title("Delhi COVID 19 INFO")
plt.show()
```



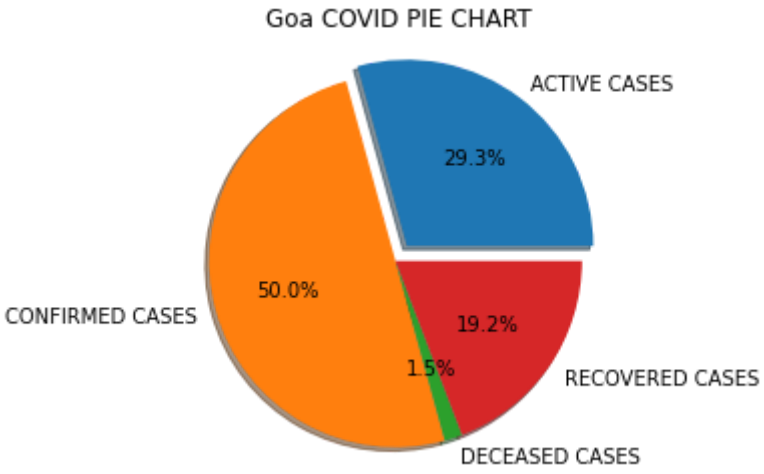

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value8=[Dadra_and_Nagar_Haveli_and_Daman_and_Diu_act,Dadra_and_Nagar_Haveli_and_Daman_and_
explode=(0.5,0,0,0)
plt.pie(value8,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Dadra_and_Nagar_Haveli_and_Daman_and_Diu COVID PIE CHART")
plt.show()
```



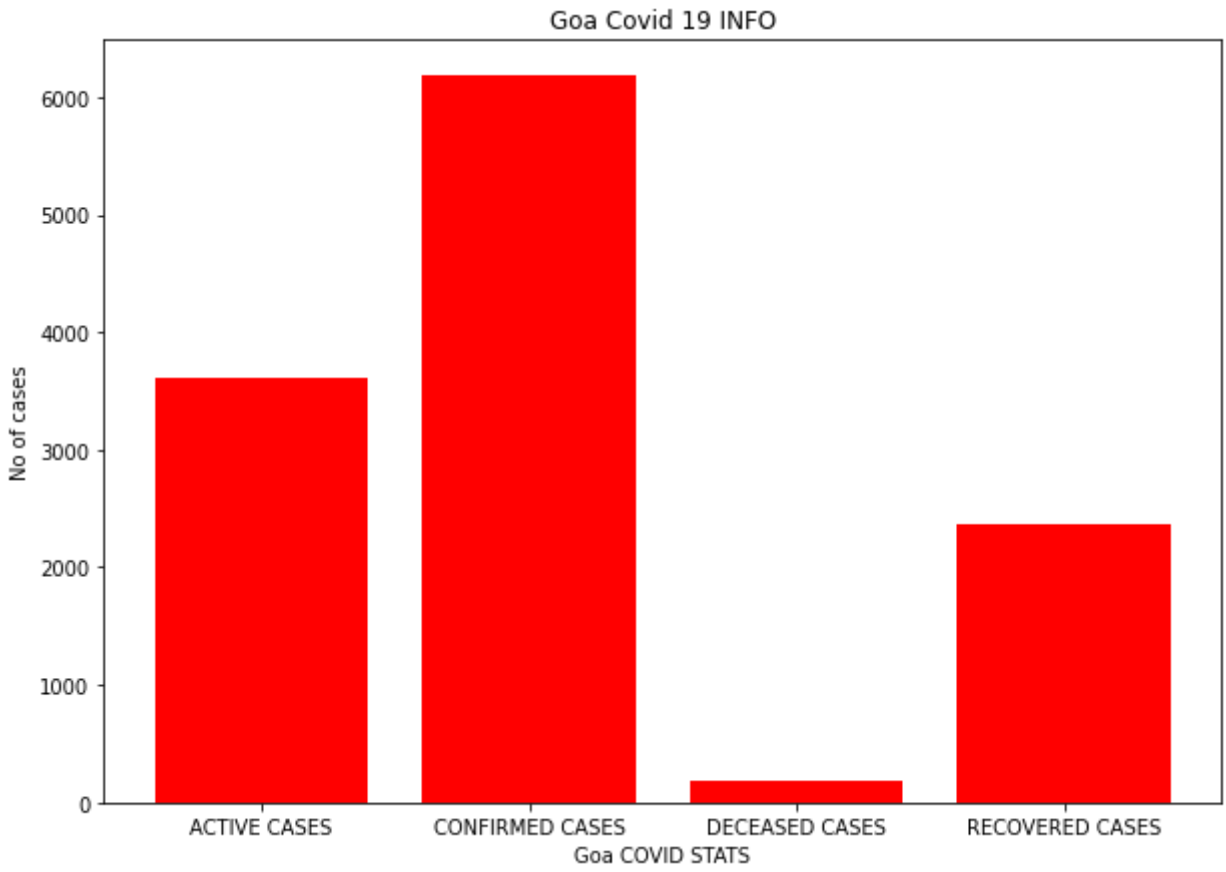

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value8,color='red')
plt.xlabel("Dadra_and_Nagar_Haveli_and_Daman_and_Diu COVID STATS")
plt.ylabel("No of cases")
plt.title("Dadra_and_Nagar_Haveli_and_Daman_and_Diu COVID 19 INFO")
plt.show()
```



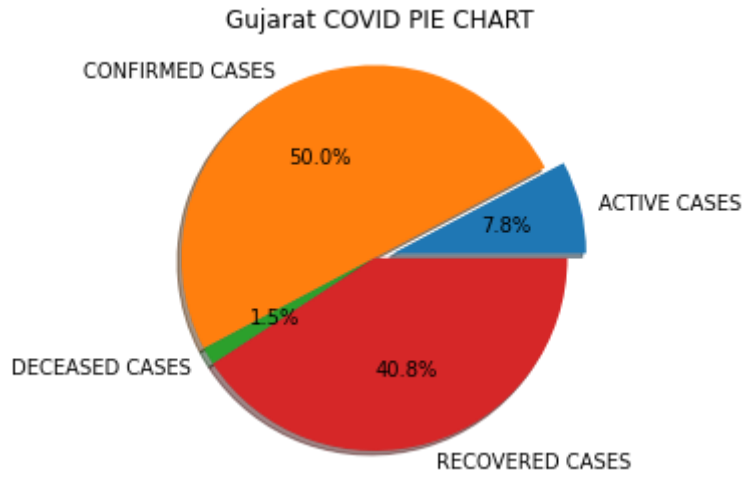

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value9=[Goa_act,Goa_con,Goa_dec,Goa_rec]
explode=(0.1,0,0,0)
plt.pie(value9,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Goa COVID PIE CHART")
plt.show()
```



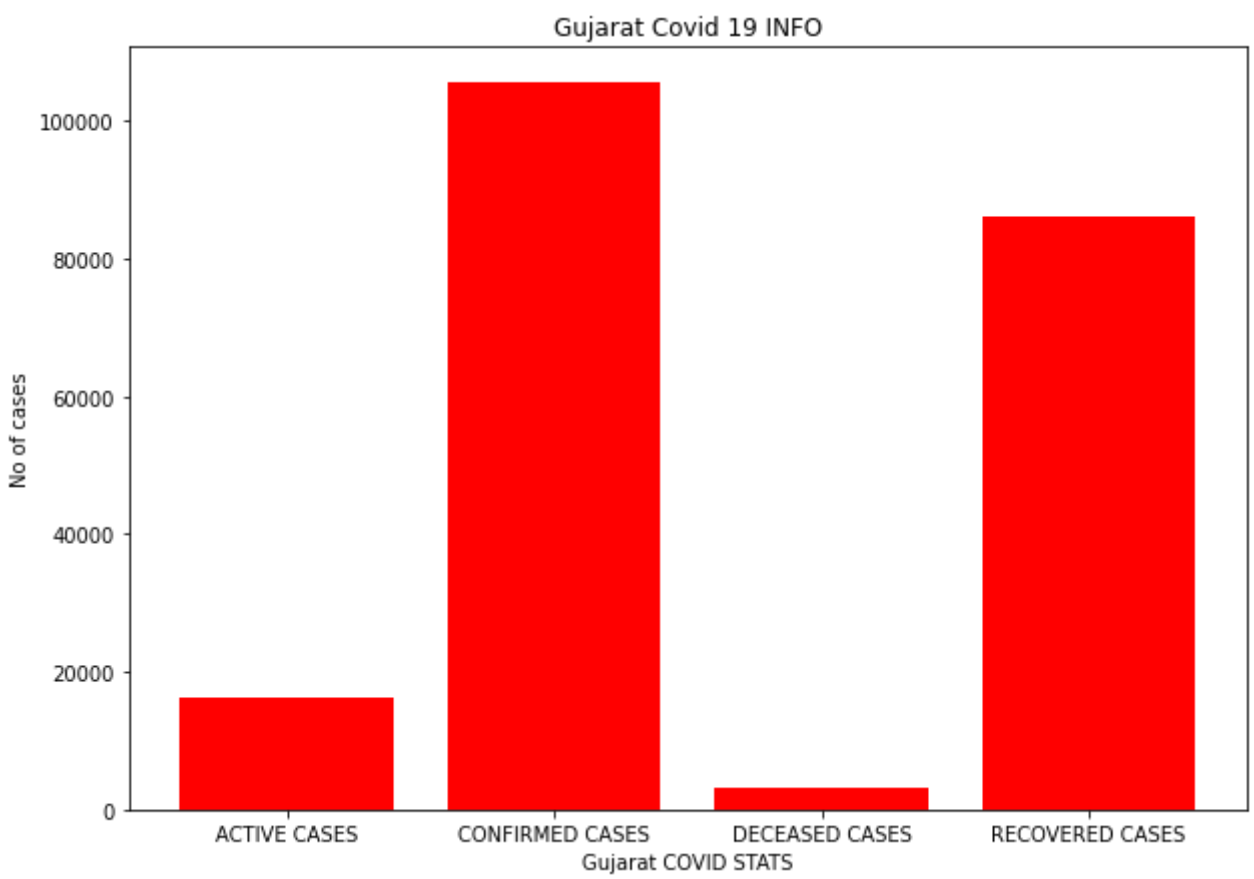

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value9,color='red')
#plt.yticks(value)
plt.xlabel("Goa COVID STATS")
plt.ylabel("No of cases")
plt.title("Goa Covid 19 INFO")
plt.show()
```



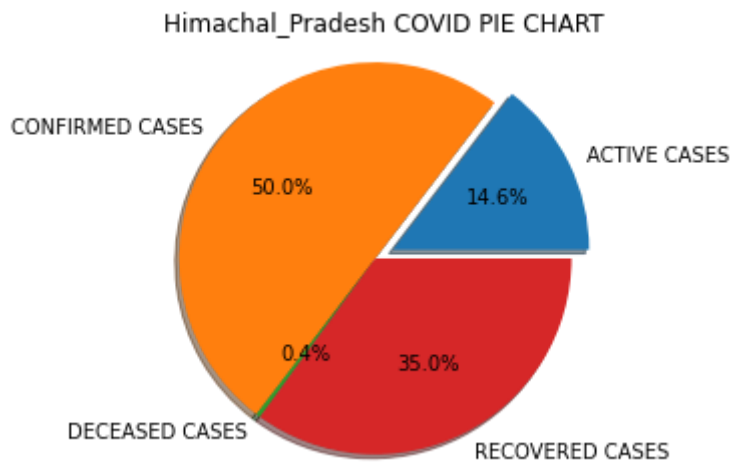

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value10=[Gujarat_act,Gujarat_con,Gujarat_dec,Gujarat_rec]
explode=(0.1,0,0,0)
plt.pie(value10,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Gujarat COVID PIE CHART")
plt.show()
```



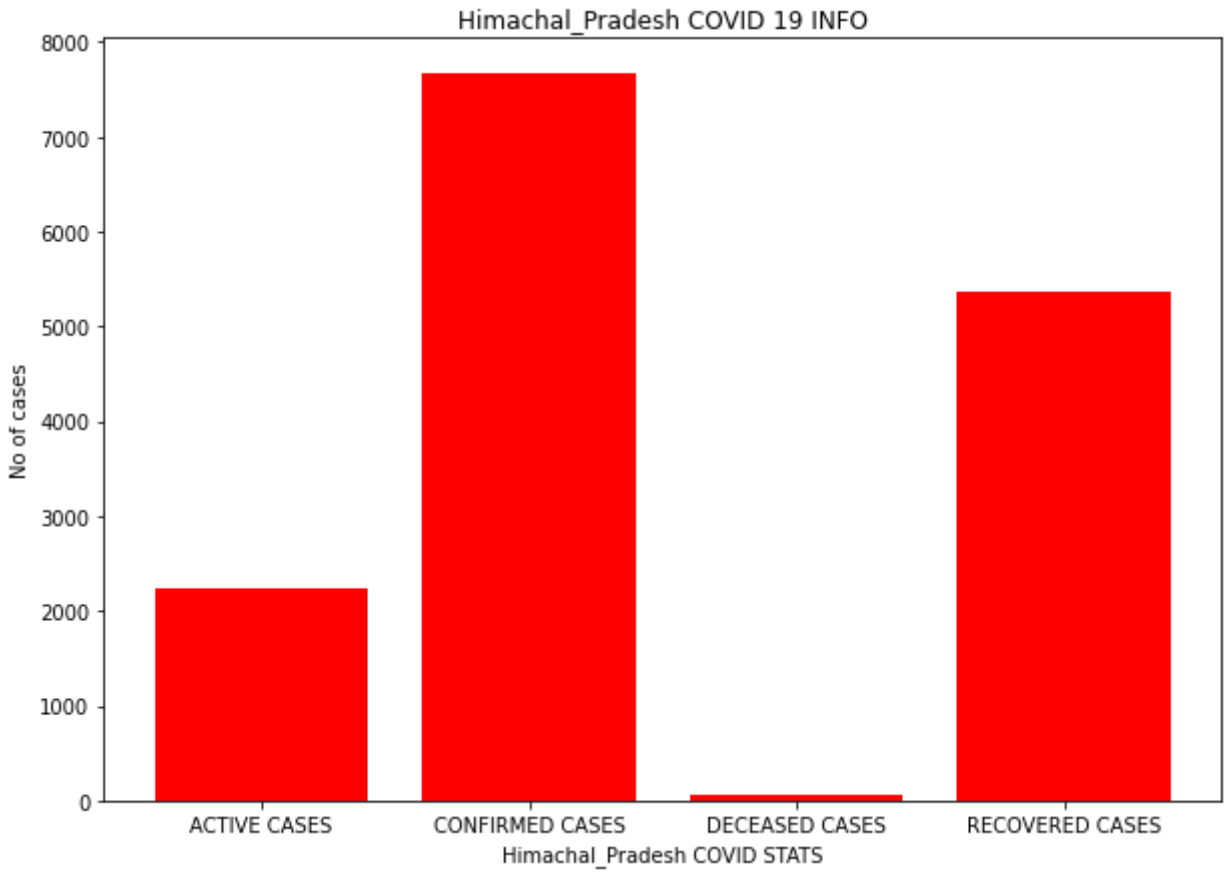

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value10,color='red')
#plt.yticks(value)
plt.xlabel("Gujarat COVID STATS")
plt.ylabel("No of cases")
plt.title("Gujarat Covid 19 INFO")
plt.show()
```



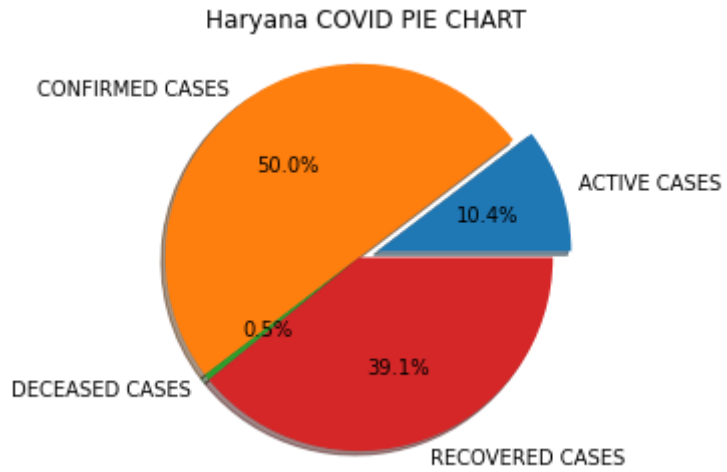

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value11=[Himachal_Pradesh_act,Himachal_Pradesh_con,Himachal_Pradesh_dec,Himachal_Pradesh_r
explode=(0.1,0,0,0)
plt.pie(value11,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Himachal_Pradesh COVID PIE CHART")
plt.show()
```



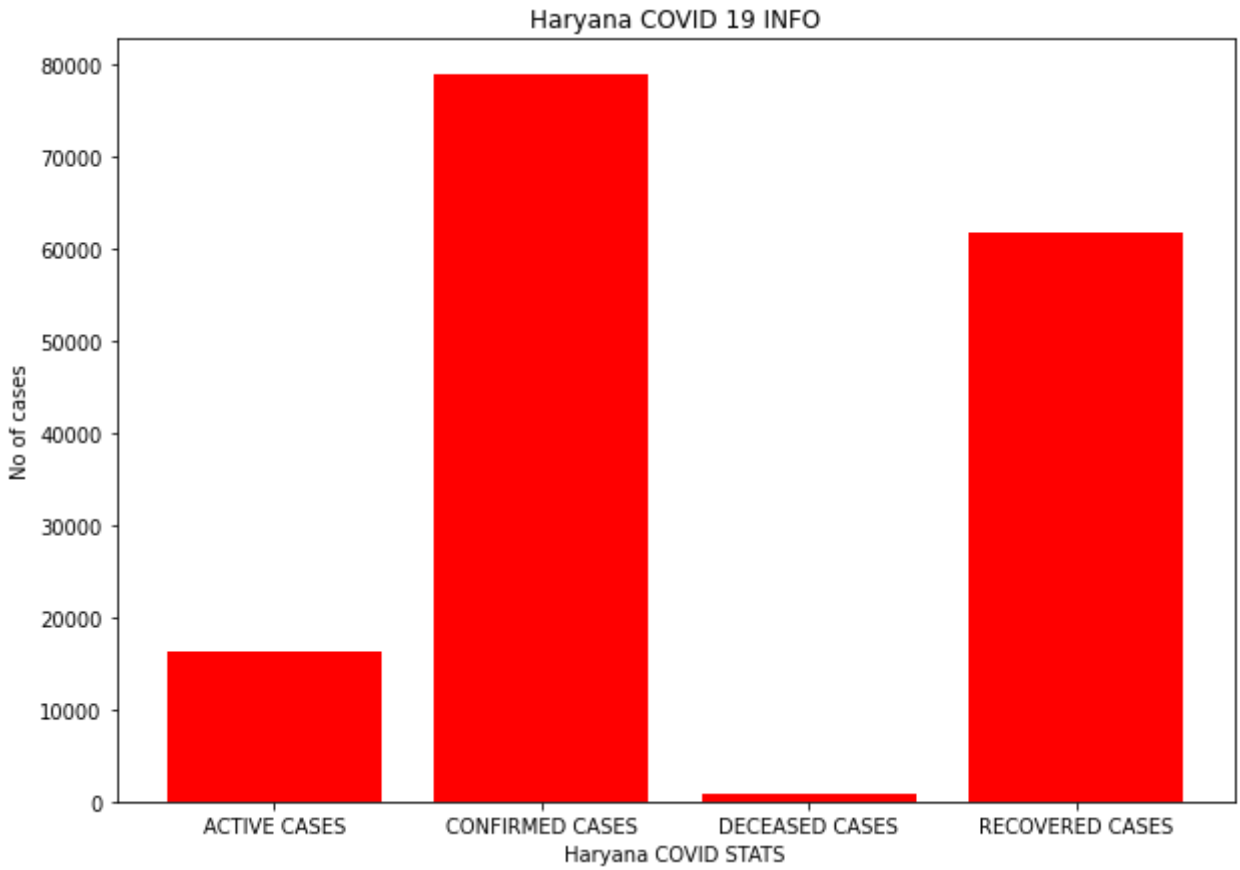

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value11,color='red')
#plt.yticks(value)
plt.xlabel("Himachal_Pradesh COVID STATS")
plt.ylabel("No of cases")
plt.title("Himachal_Pradesh COVID 19 INFO")
plt.show()
```



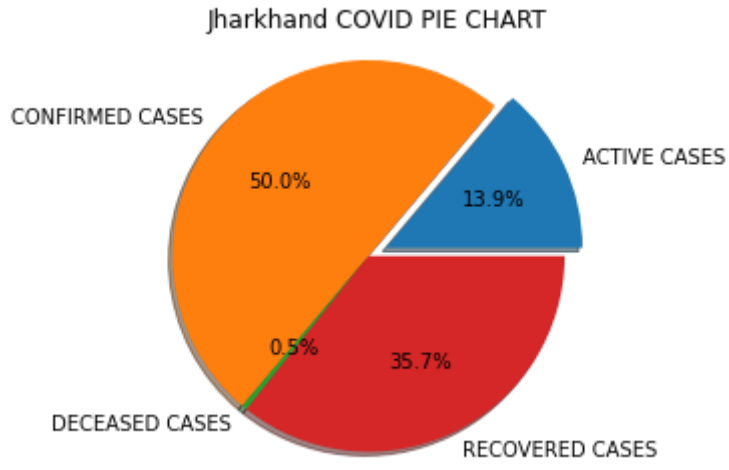

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value12=[Haryana_act,Haryana_con,Haryana_dec,Haryana_rec]
explode=(0.1,0,0,0)
plt.pie(value12,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Haryana COVID PIE CHART")
plt.show()
```



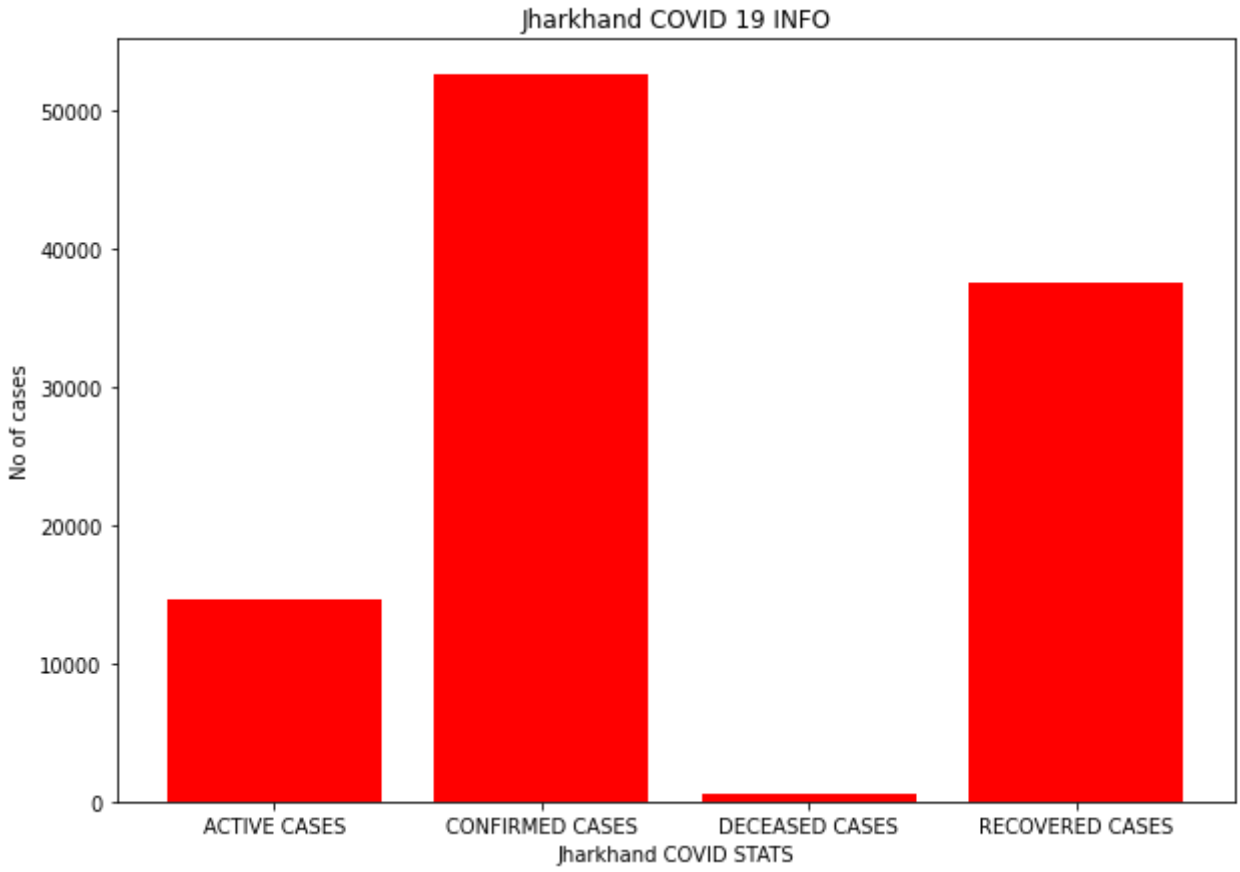

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value12,color='red')
#plt.yticks(value)
plt.xlabel("Haryana COVID STATS")
plt.ylabel("No of cases")
plt.title("Haryana COVID 19 INFO")
plt.show()
```



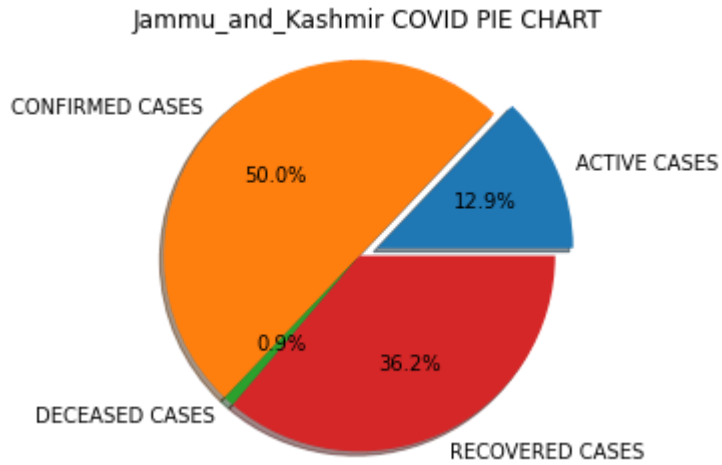

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value13=[Jharkhand_act,Jharkhand_con,Jharkhand_dec,Jharkhand_rec]
explode=(0.1,0,0,0)
plt.pie(value13,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Jharkhand COVID PIE CHART")
plt.show()
```




```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value13,color='red')
#plt.yticks(value)
plt.xlabel("Jharkhand COVID STATS")
plt.ylabel("No of cases")
plt.title("Jharkhand COVID 19 INFO")
plt.show()
```

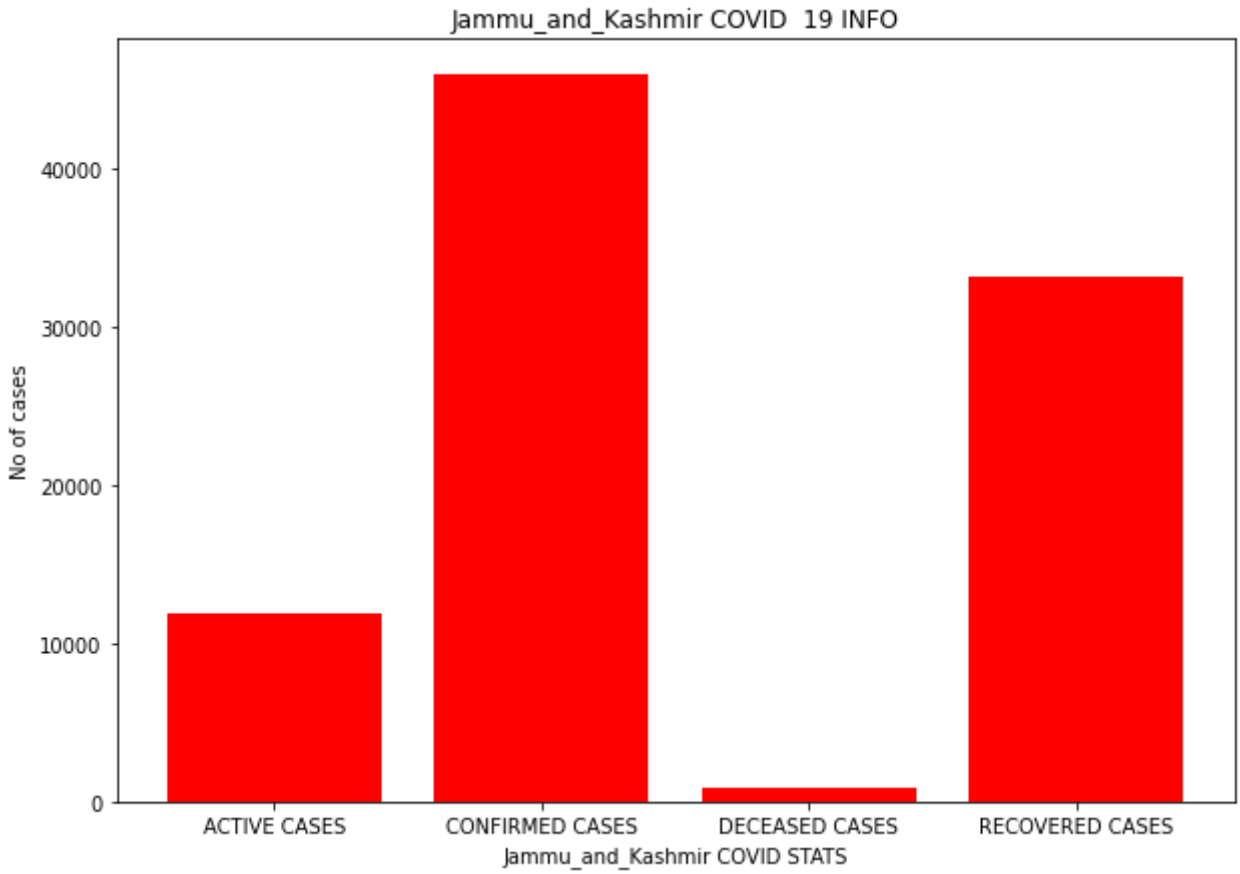



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value14=[Jammu_and_Kashmir_act,Jammu_and_Kashmir_con,Jammu_and_Kashmir_dec,Jammu_and_Kashm
explode=(0.1,0,0,0)
plt.pie(value14,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Jammu_and_Kashmir COVID PIE CHART")
plt.show()
```

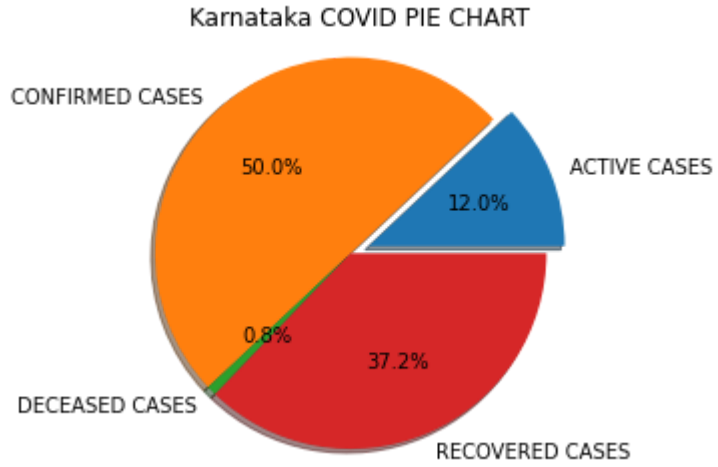



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value14,color='red')
#plt.yticks(value)
plt.xlabel("Jammu_and_Kashmir COVID STATS")
plt.ylabel("No of cases")
plt.title("Jammu_and_Kashmir COVID  19 INFO")
plt.show()
```

```
plt.show()
```

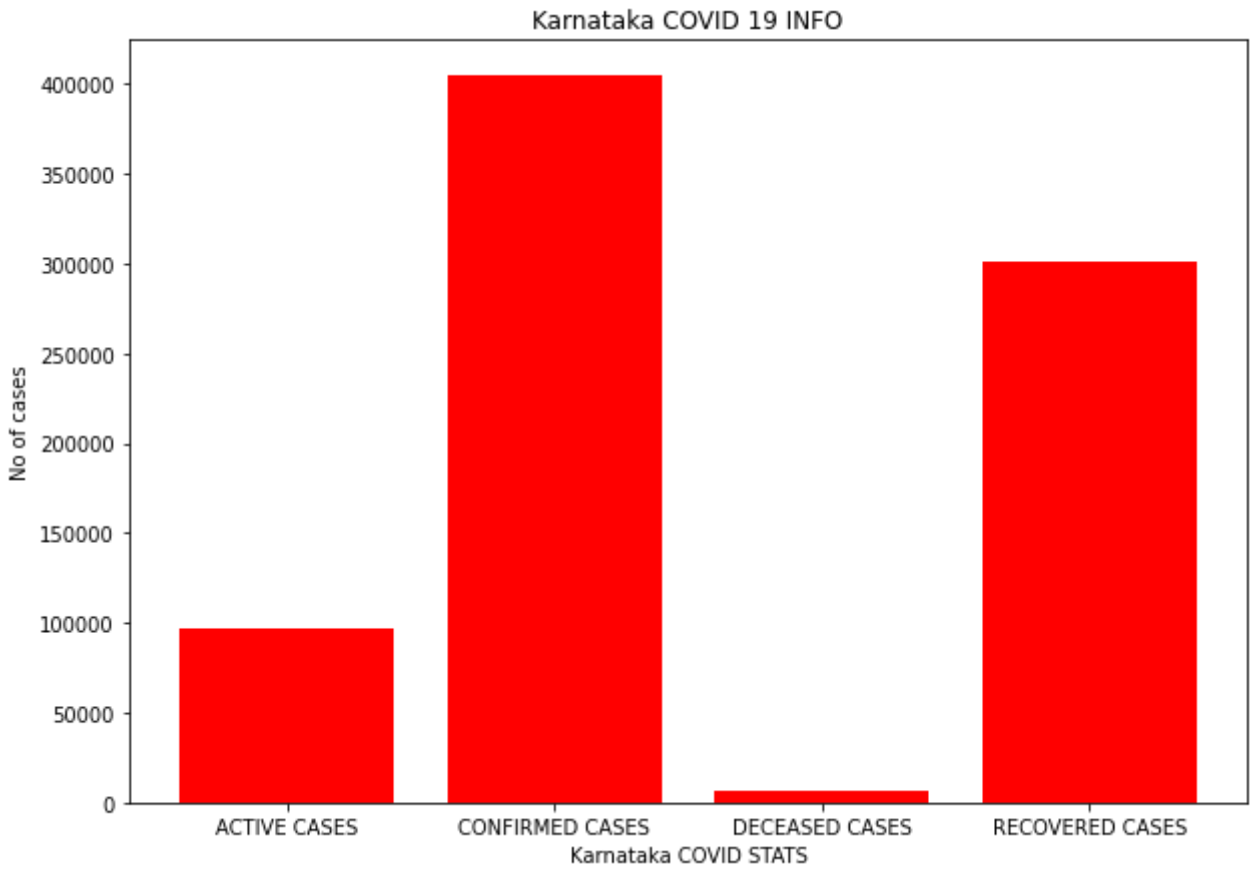



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value15=[Karnataka_act,Karnataka_con,Karnataka_dec,Karnataka_rec]
explode=(0.1,0,0,0)
plt.pie(value15,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Karnataka COVID PIE CHART")
plt.show()
```

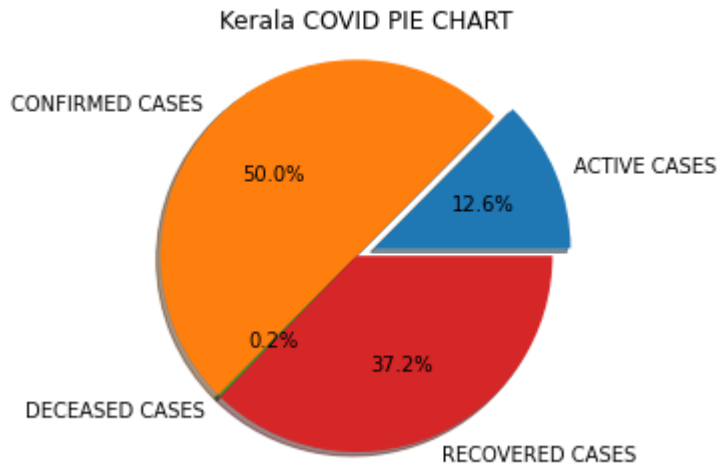



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value15,color='red')
#plt.yticks(value)
plt.xlabel("Karnataka COVID STATS")
plt.ylabel("No of cases")
plt.title("Karnataka COVID 19 INFO")
```

```
plt.show()
```

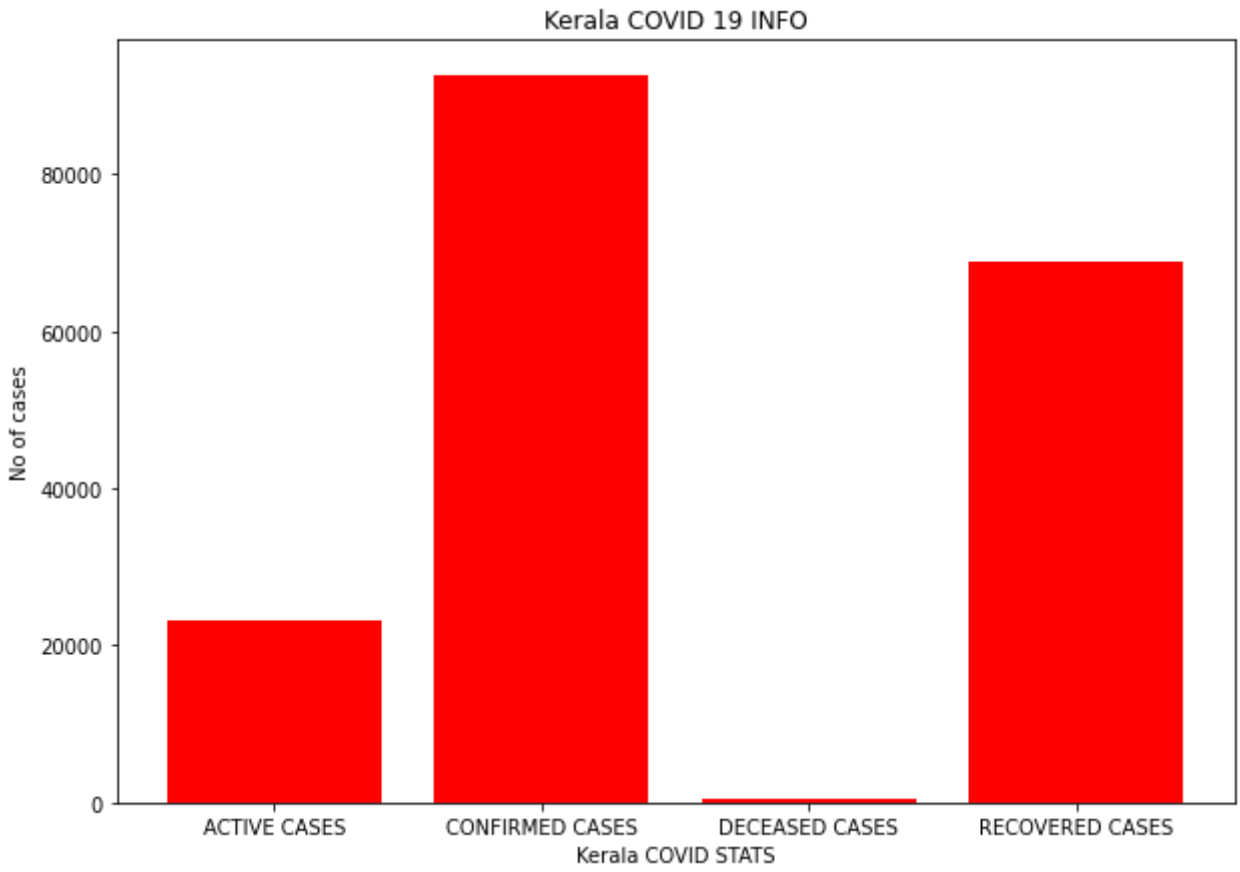



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value16=[Kerala_act,Kerala_con,Kerala_dec,Kerala_rec]
explode=(0.1,0,0,0)
plt.pie(value16,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Kerala COVID PIE CHART")
plt.show()
```

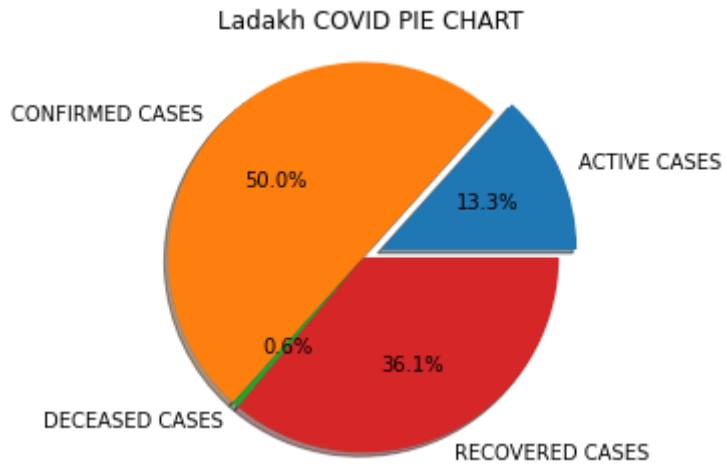



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value16,color='red')
#plt.yticks(value)
plt.xlabel("Kerala COVID STATS")
plt.ylabel("No of cases")
plt.title("Kerala COVID 19 INFO")
```

```
plt.show()
```

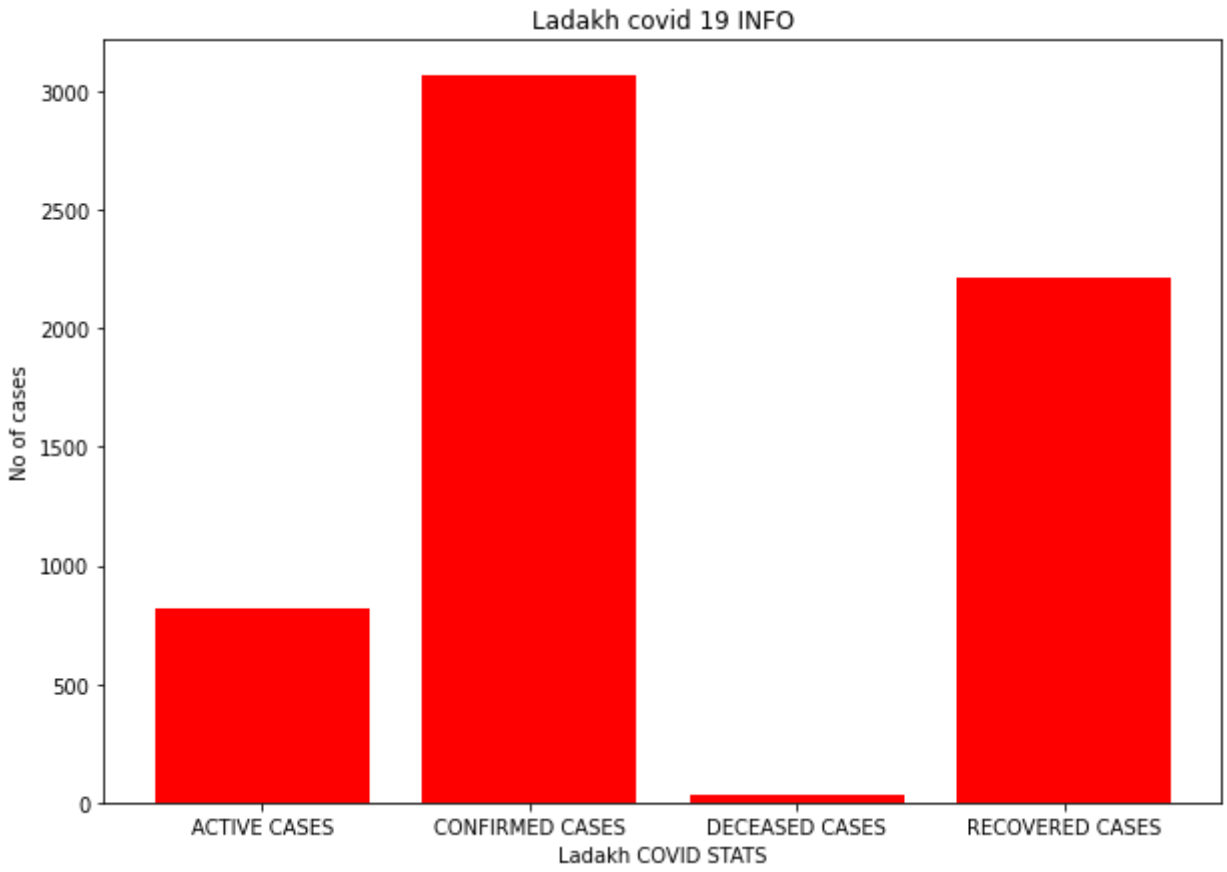



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value17=[Ladakh_act,Ladakh_con,Ladakh_dec,Ladakh_rec]
explode=(0.1,0,0,0)
plt.pie(value17,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Ladakh COVID PIE CHART")
plt.show()
```

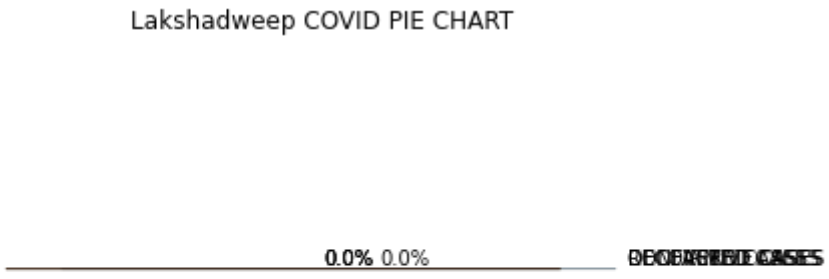



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value17,color='red')
#plt.yticks(value)
plt.xlabel("Ladakh COVID STATS")
plt.ylabel("No of cases")
```

```
plt.title("Ladakh covid 19 INFO")
plt.show()
```

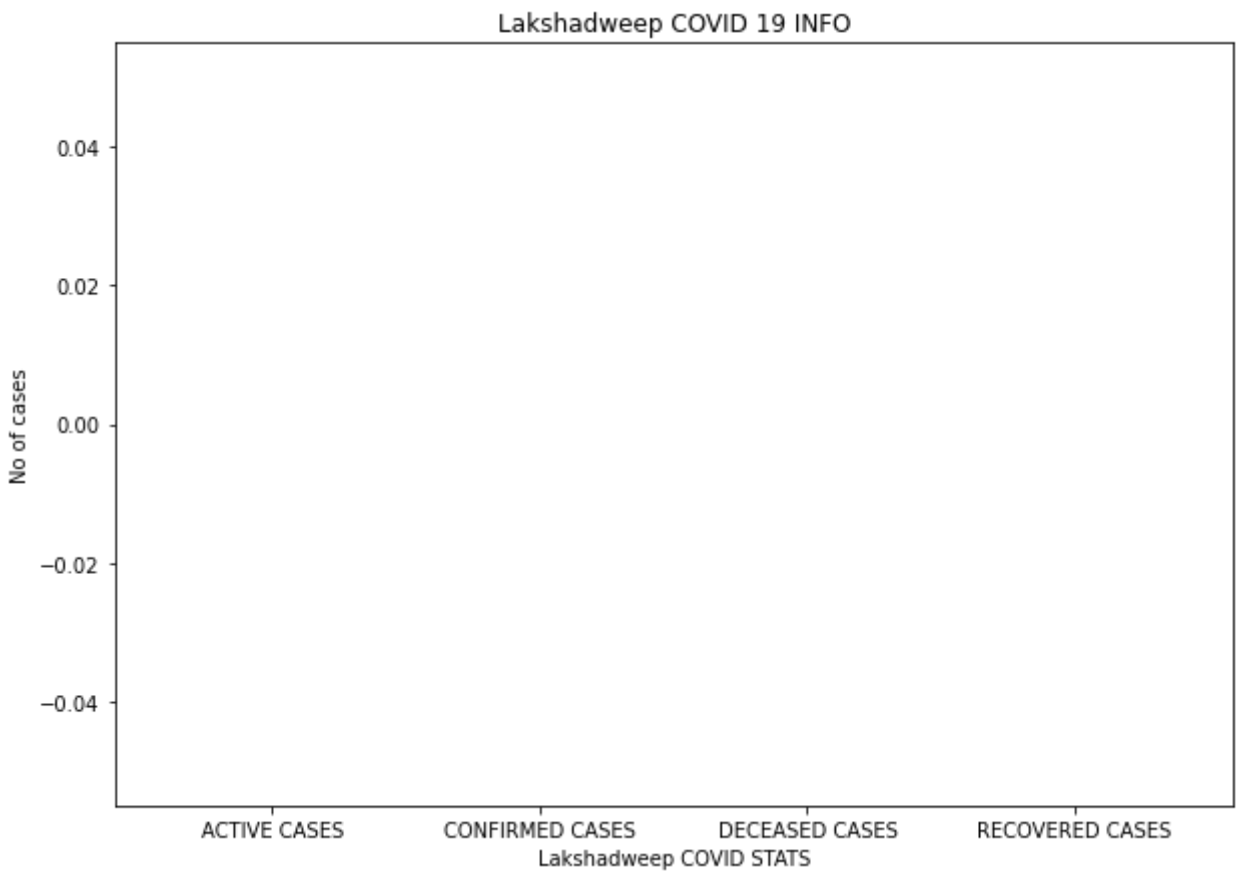



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value18=[Lakshadweep_act,Lakshadweep_con,Lakshadweep_dec,Lakshadweep_rec]
explode=(0.1,0,0,0)
plt.pie(value18,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Lakshadweep COVID PIE CHART")
plt.show()
```

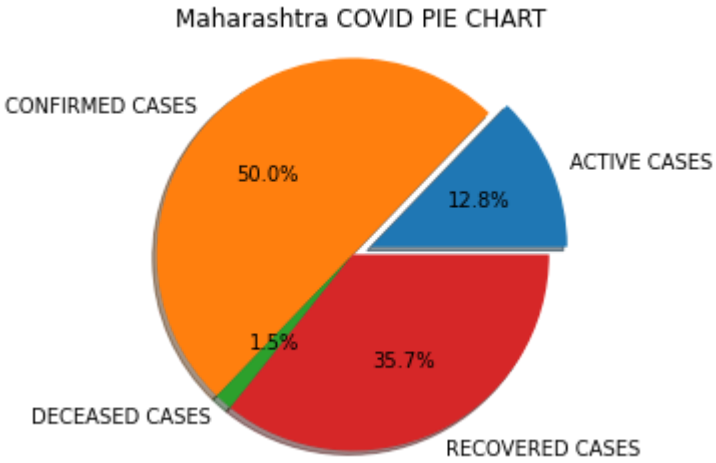



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value18,color='red')
#plt.yticks(value)
plt.xlabel("Lakshadweep COVID STATS")
plt.ylabel("No of cases")
```

```
plt.title("Lakshadweep COVID 19 INFO")
plt.show()
```

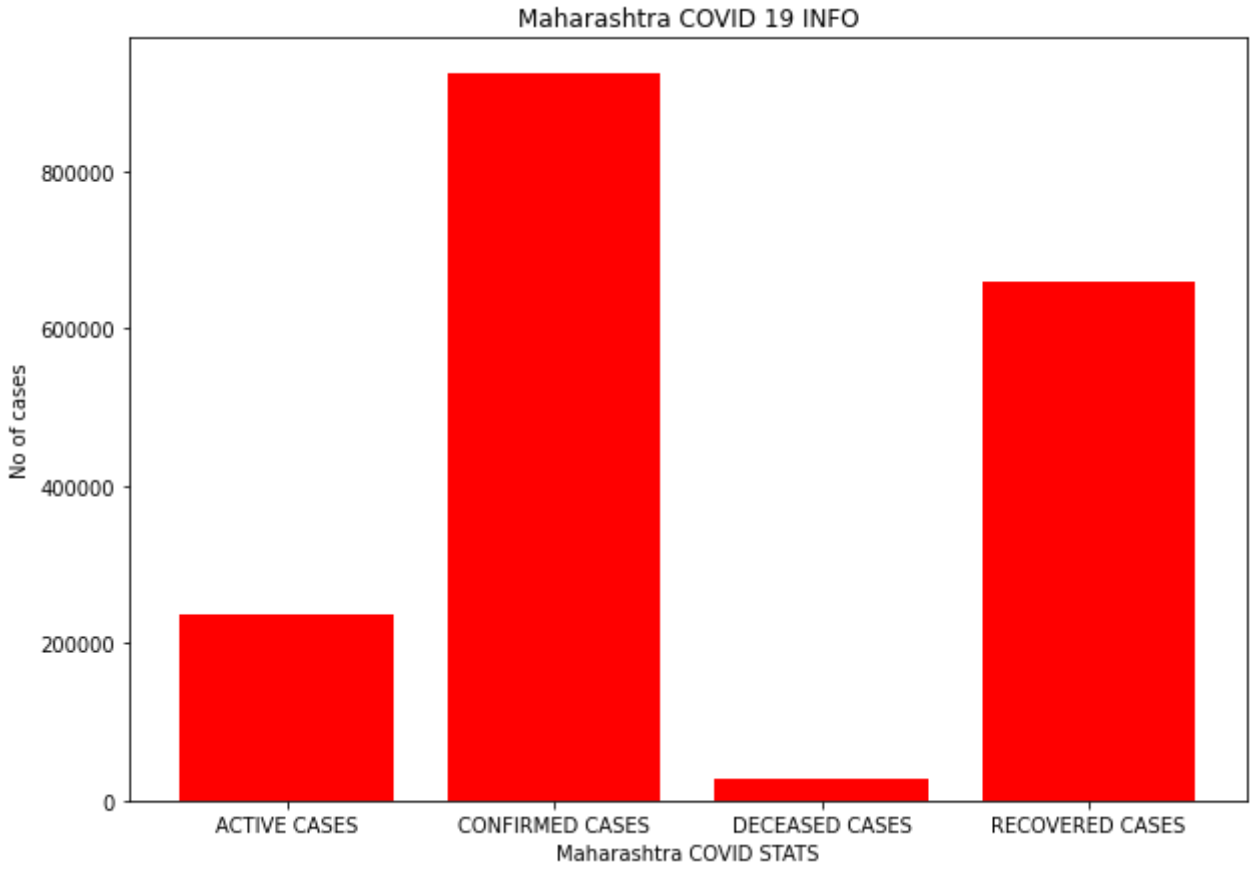



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value19=[Maharashtra_act,Maharashtra_con,Maharashtra_dec,Maharashtra_rec]
explode=(0.1,0,0,0)
plt.pie(value19,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Maharashtra COVID PIE CHART")
plt.show()
```

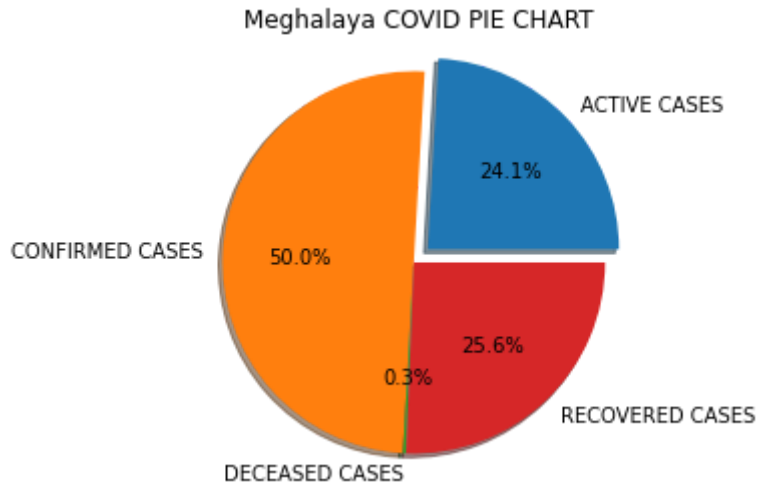



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value19,color='red')
#plt.yticks(value)
plt.xlabel("Maharashtra COVID STATS")
```

```
plt.ylabel("No of cases")
plt.title("Maharashtra COVID 19 INFO")
plt.show()
```

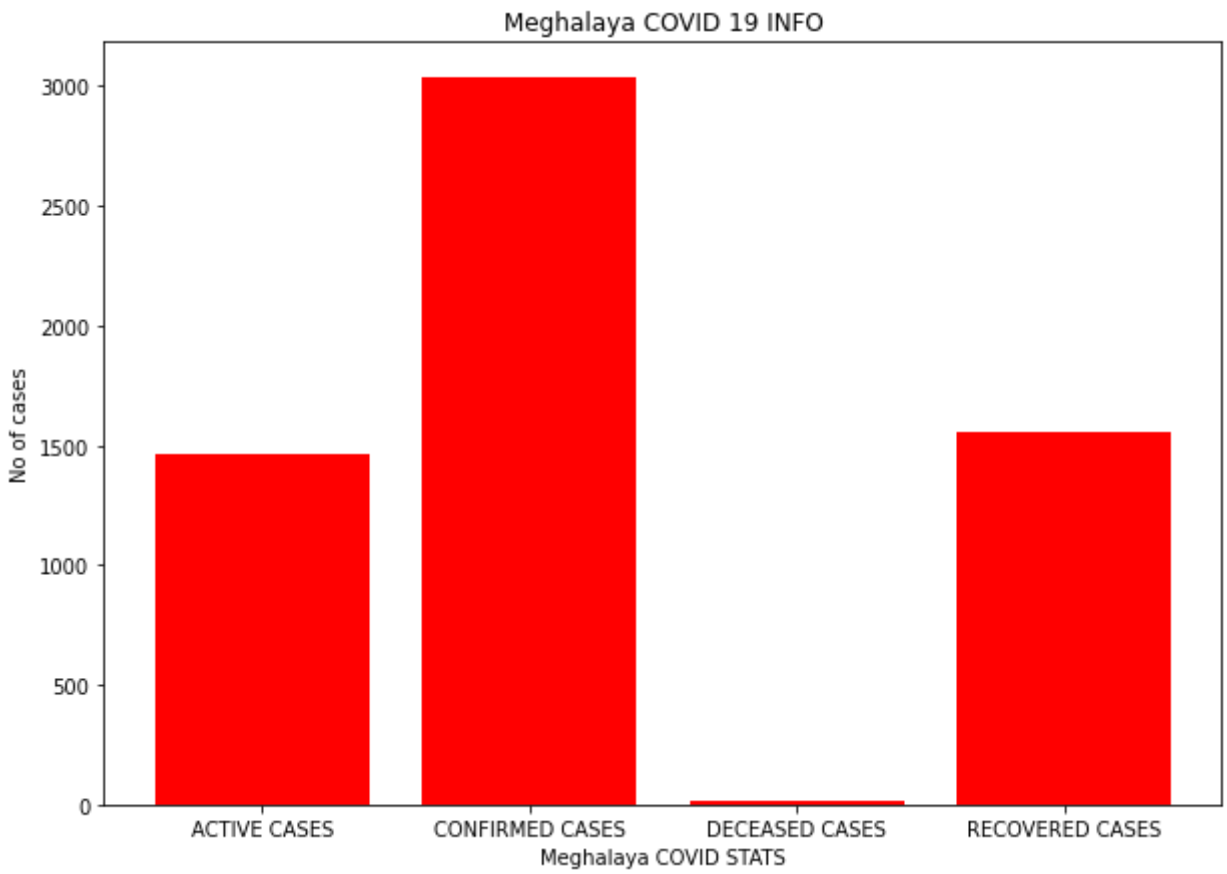



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value20=[Meghalaya_act,Meghalaya_con,Meghalaya_dec,Meghalaya_rec]
explode=(0.1,0,0,0)
plt.pie(value20,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Meghalaya COVID PIE CHART")
plt.show()
```

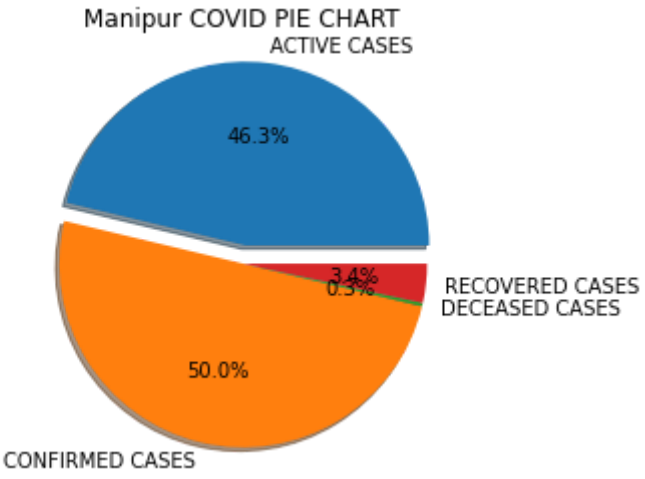



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value20,color='red')
#plt.yticks(value)
plt.xlabel("Meghalaya COVID STATS")
```

```
plt.ylabel("No of cases")
plt.title("Meghalaya COVID 19 INFO")
plt.show()
```

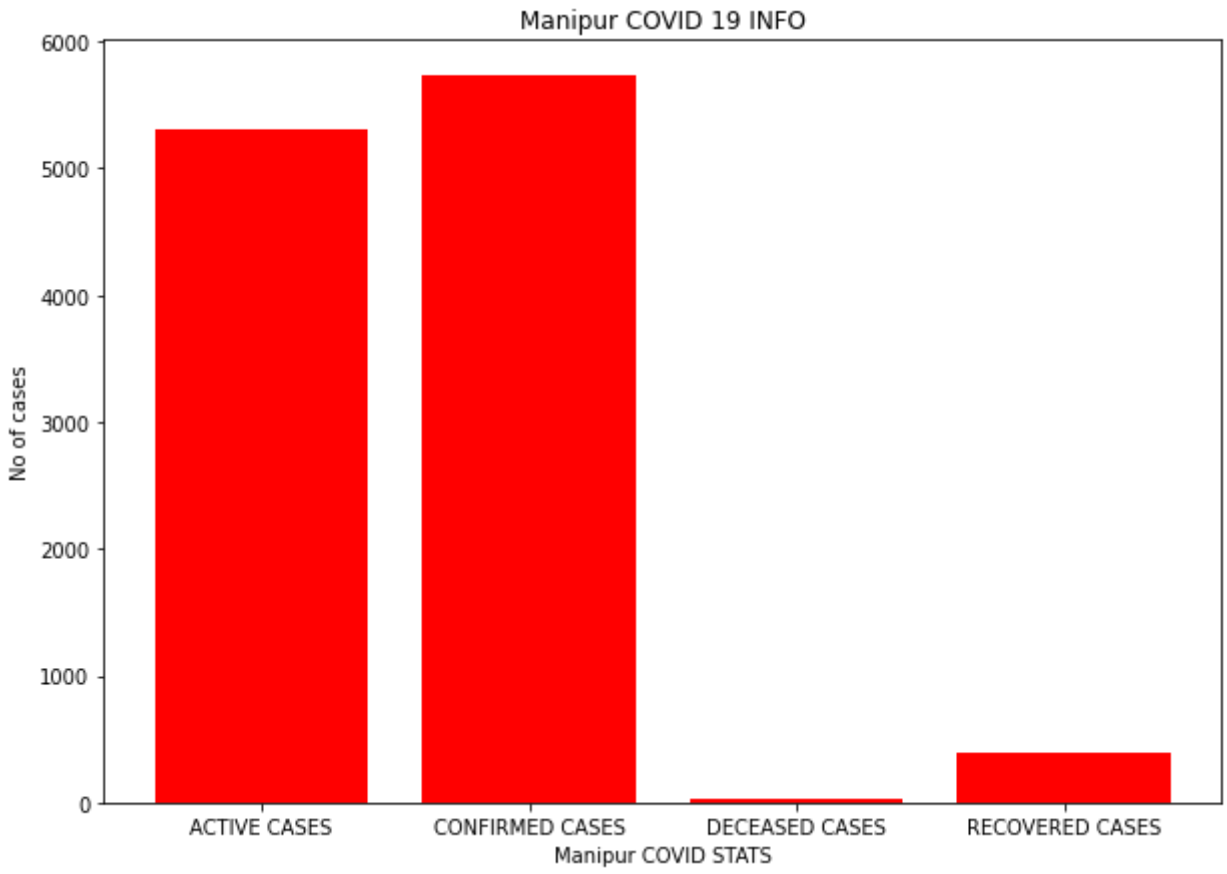



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value21=[Manipur_act,Manipur_con,Manipur_dec,Manipur_rec]
explode=(0.1,0,0,0)
plt.pie(value21,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Manipur COVID PIE CHART")
plt.show()
```

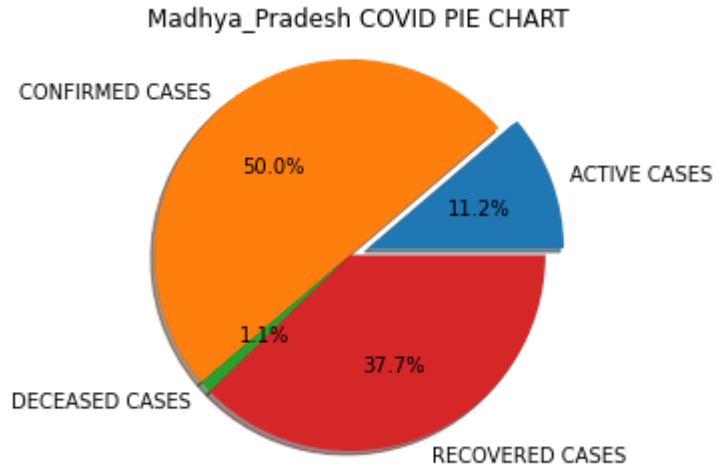



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value21,color='red')
#plt.yticks(value)
```

```
plt.xlabel("Manipur COVID STATS")
plt.ylabel("No of cases")
plt.title("Manipur COVID 19 INFO")
plt.show()
```

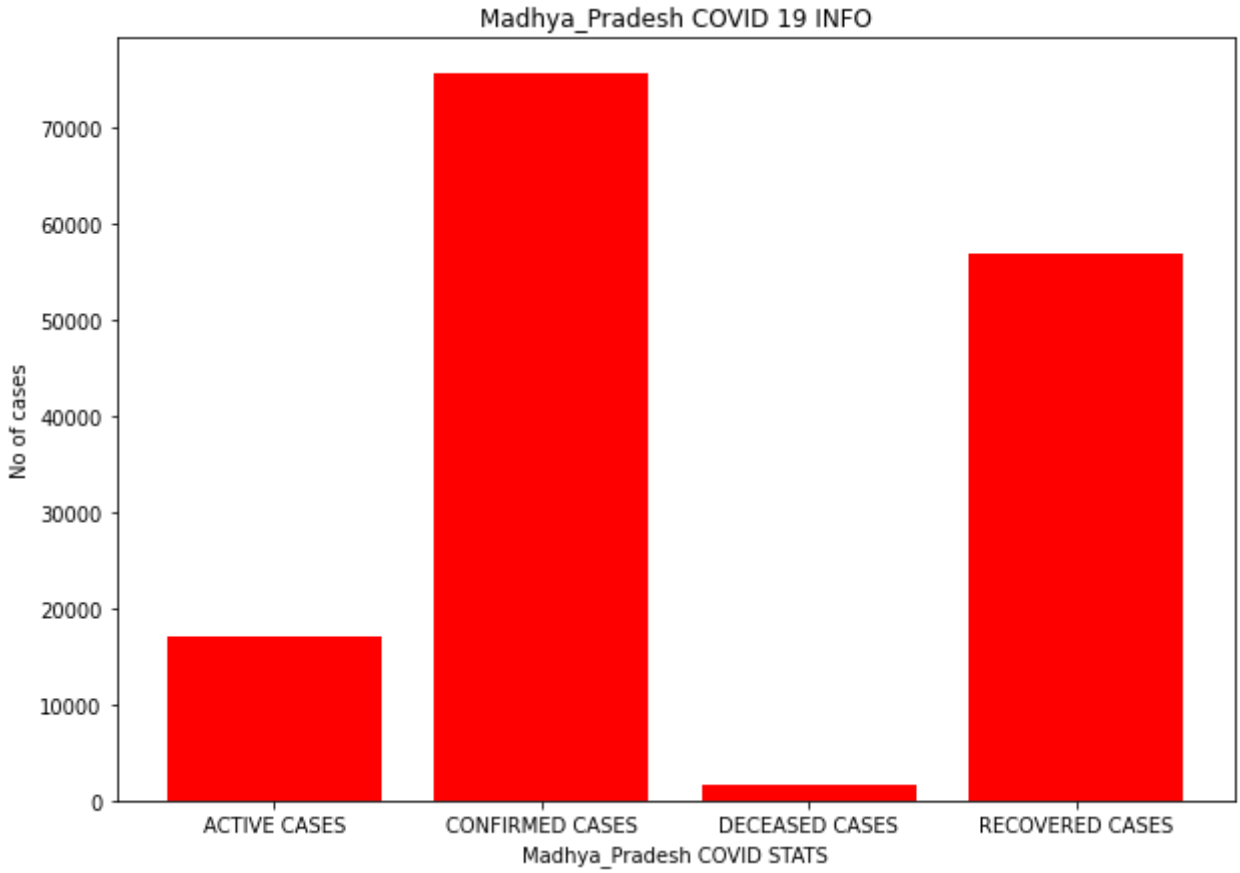



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value22=[Madhya_Pradesh_act,Madhya_Pradesh_con,Madhya_Pradesh_dec,Madhya_Pradesh_rec]
explode=(0.1,0,0,0)
plt.pie(value22,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Madhya_Pradesh COVID PIE CHART")
plt.show()
```

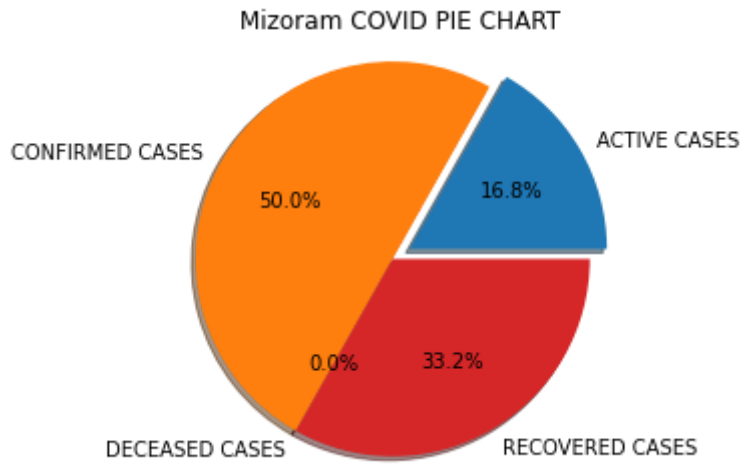



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value22,color='red')
#plt.yticks(value)
```

```
plt.xlabel("Madhya_Pradesh COVID STATS")
plt.ylabel("No of cases")
plt.title("Madhya_Pradesh COVID 19 INFO")
plt.show()
```

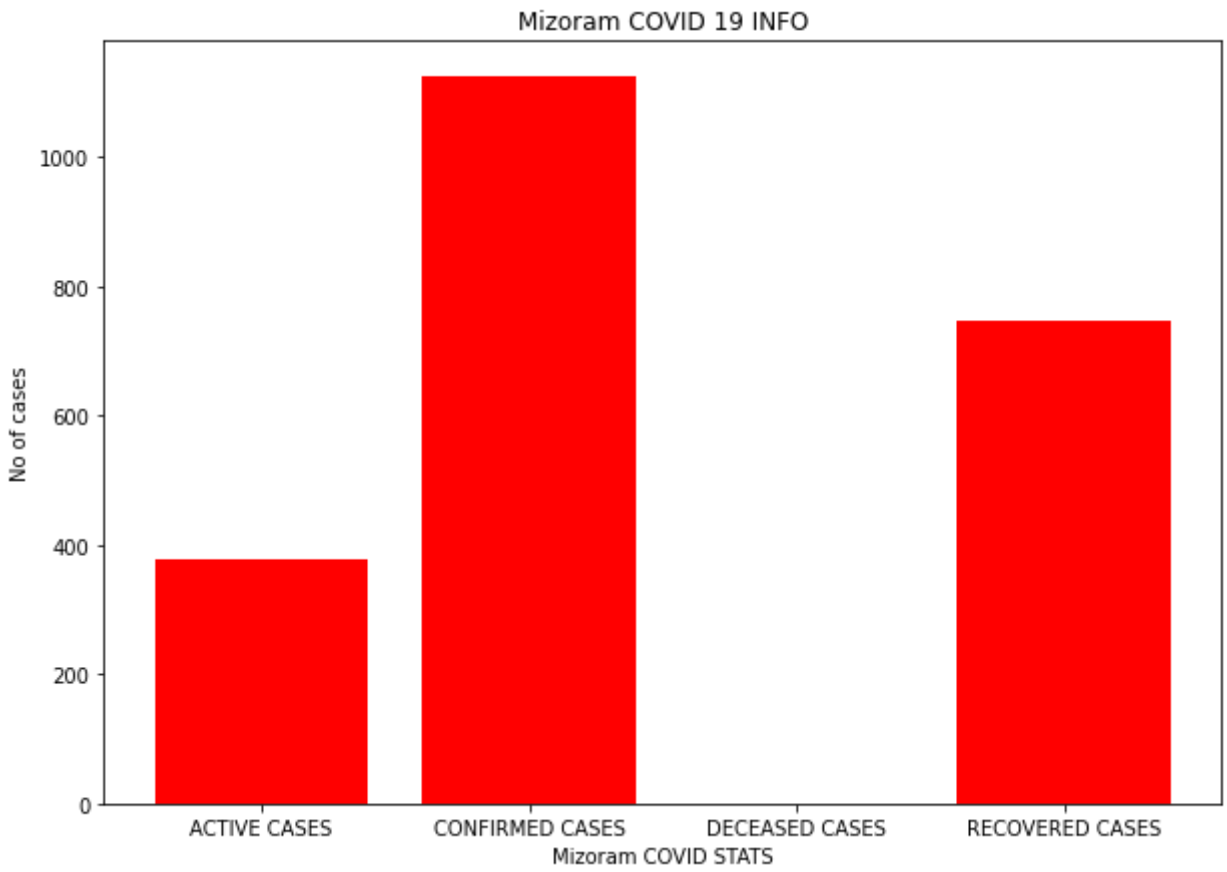



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value23=[Mizoram_act,Mizoram_con,Mizoram_dec,Mizoram_rec]
explode=(0.1,0,0,0)
plt.pie(value23,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Mizoram COVID PIE CHART")
plt.show()
```

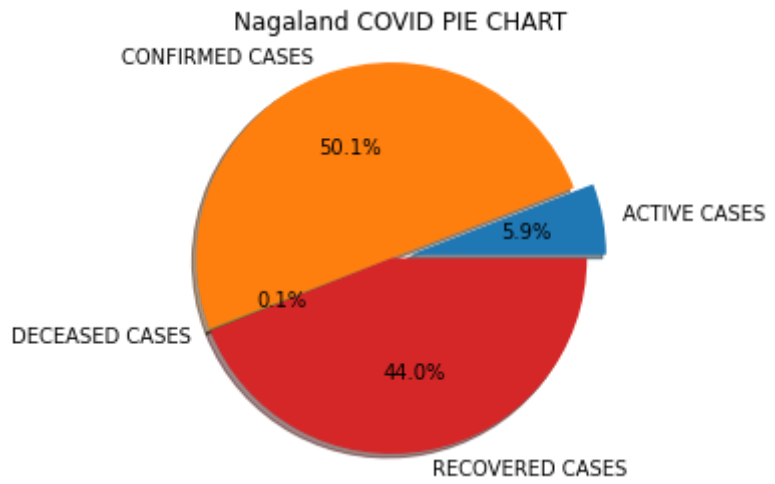



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value23,color='red')
#plt.yticks(value)
```

```
#plt.yticks(value)
plt.xlabel("Mizoram COVID STATS")
plt.ylabel("No of cases")
plt.title("Mizoram COVID 19 INFO")
plt.show()
```

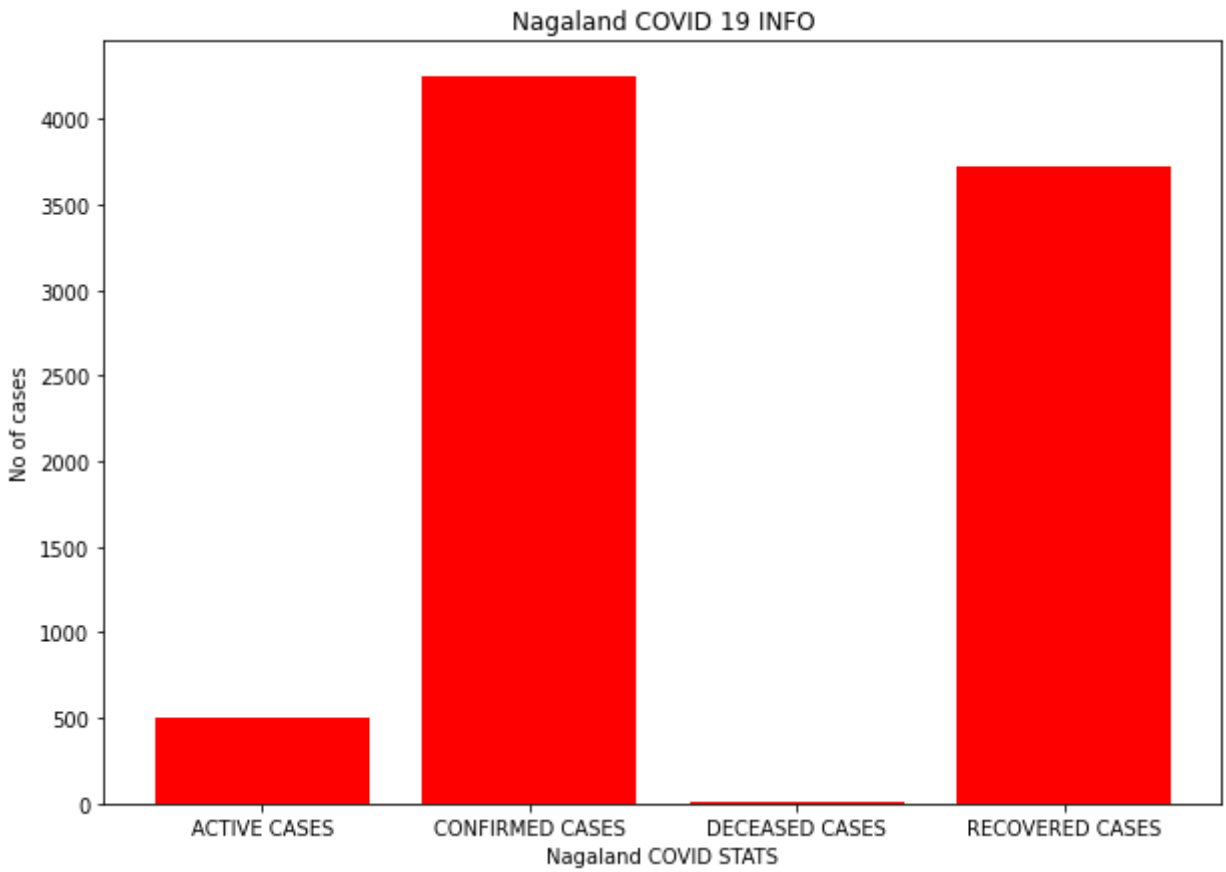



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value24=[Nagaland_act,Nagaland_con,Nagaland_dec,Nagaland_rec]
explode=(0.1,0,0,0)
plt.pie(value24,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Nagaland COVID PIE CHART")
plt.show()
```

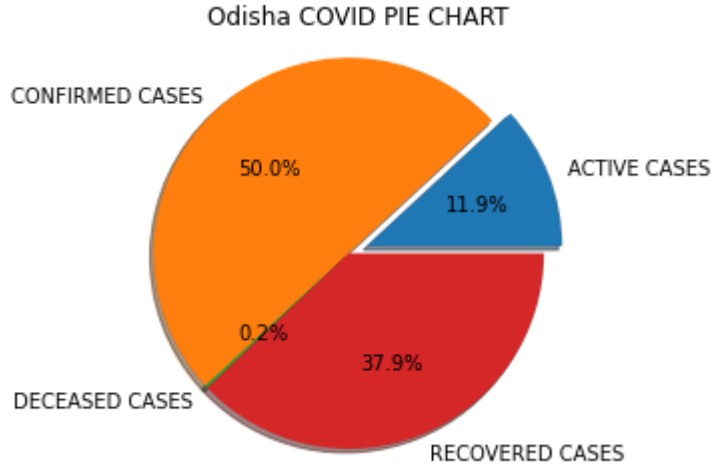



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value24,color='red')
```

```
#plt.yticks(value)
plt.xlabel("Nagaland COVID STATS")
plt.ylabel("No of cases")
plt.title("Nagaland COVID 19 INFO")
plt.show()
```

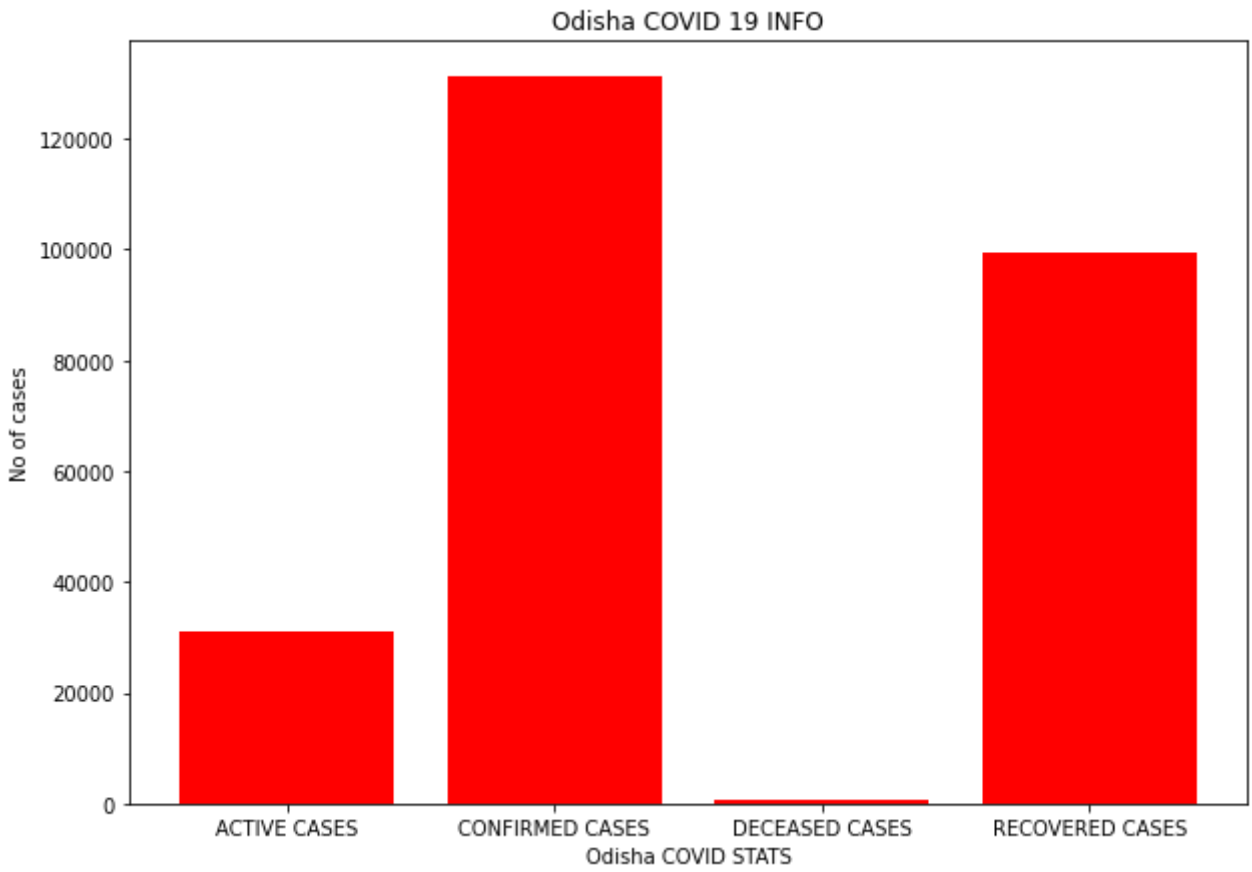



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value25=[Odisha_act,Odisha_con,Odisha_dec,Odisha_rec]
explode=(0.1,0,0,0)
plt.pie(value25,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Odisha COVID PIE CHART")
plt.show()
```

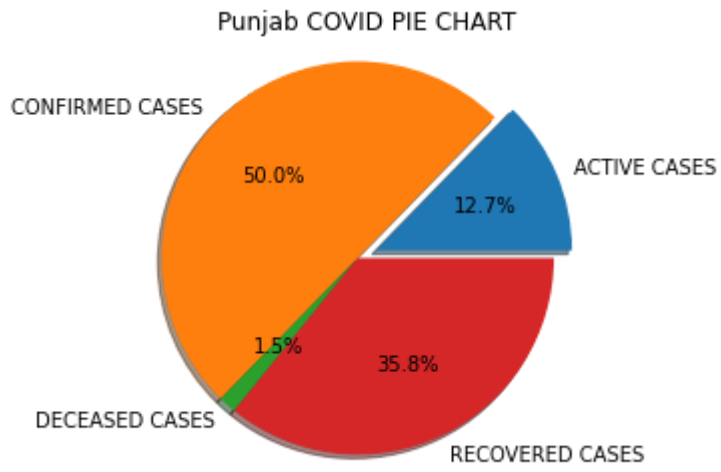



```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value25,color='red')
```

```
plt.bar(sub,value25,color = 'red')
#plt.yticks(value)
plt.xlabel("Odisha COVID STATS")
plt.ylabel("No of cases")
plt.title("Odisha COVID 19 INFO")
plt.show()
```

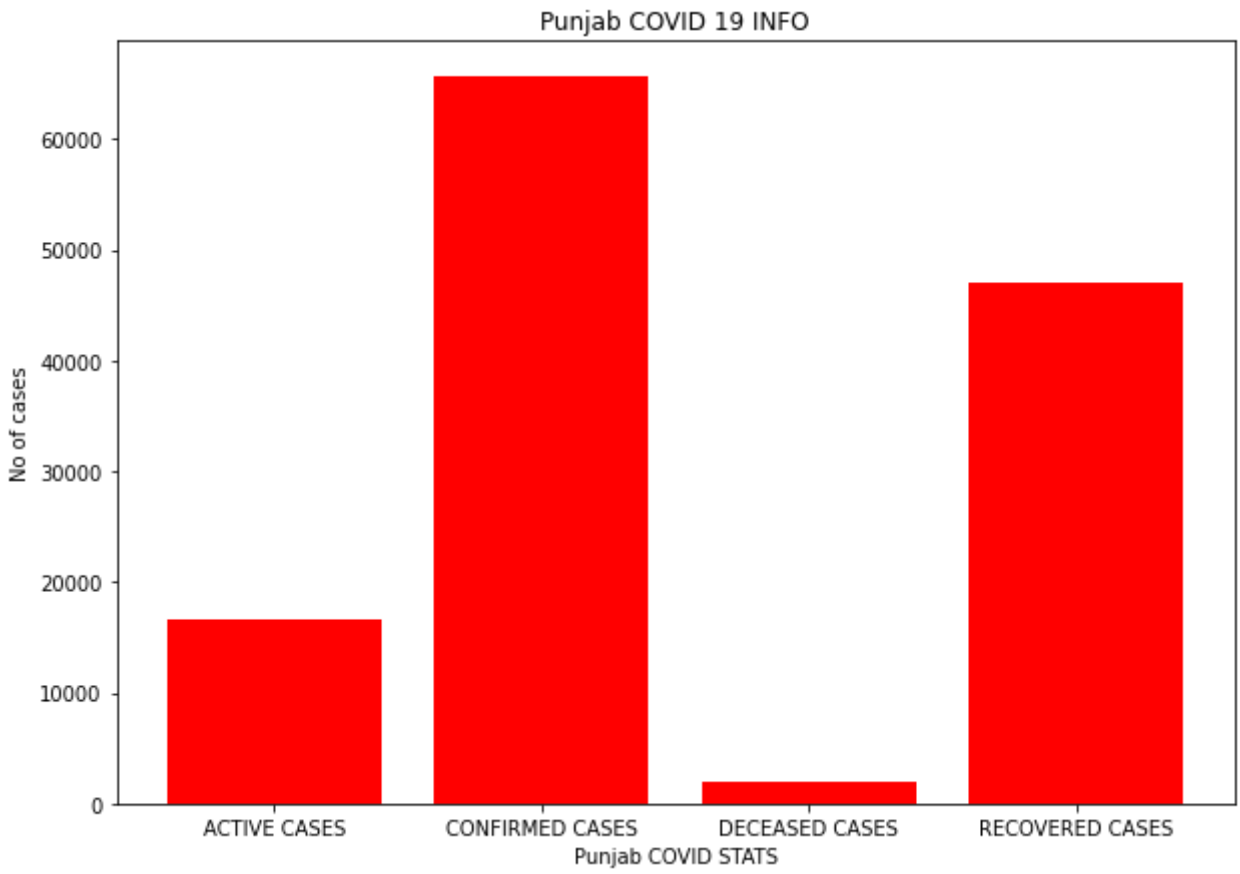



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value26=[Punjab_act,Punjab_con,Punjab_dec,Punjab_rec]
explode=(0.1,0,0,0)
plt.pie(value26,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Punjab COVID PIE CHART")
plt.show()
```

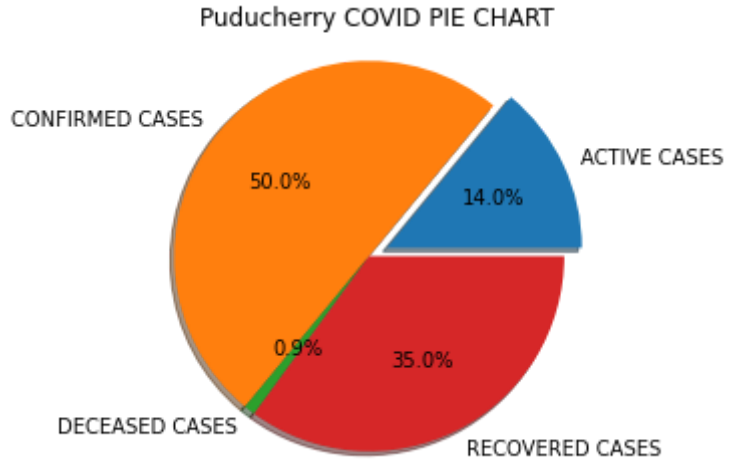



```
fig=plt.figure(figsize=(10,7))
```

```
plt.bar(sub,value26,color='red')
#plt.yticks(value)
plt.xlabel("Punjab COVID STATS")
plt.ylabel("No of cases")
plt.title("Punjab COVID 19 INFO")
plt.show()
```

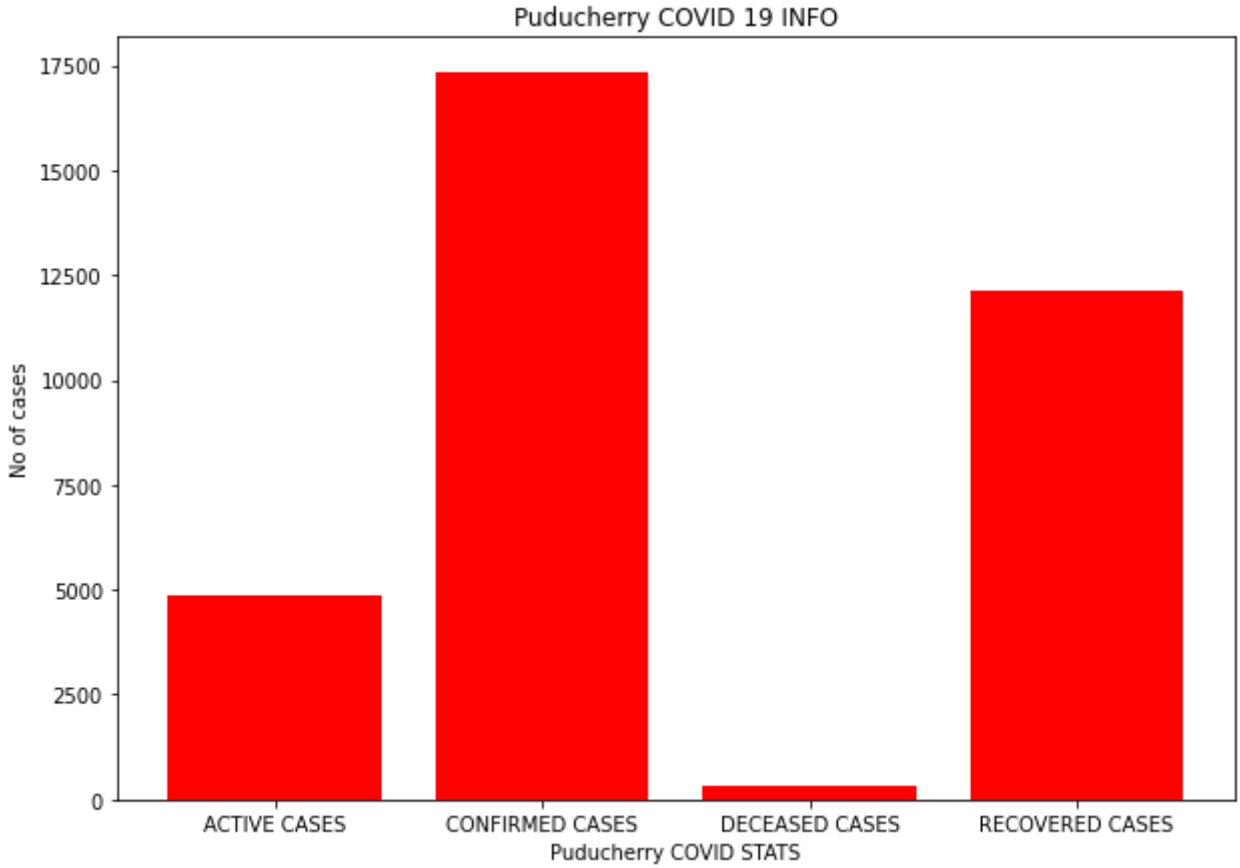



```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value27=[Puducherry_act,Puducherry_con,Puducherry_dec,Puducherry_rec]
explode=(0.1,0,0,0)
plt.pie(value27,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Puducherry COVID PIE CHART")
plt.show()
```

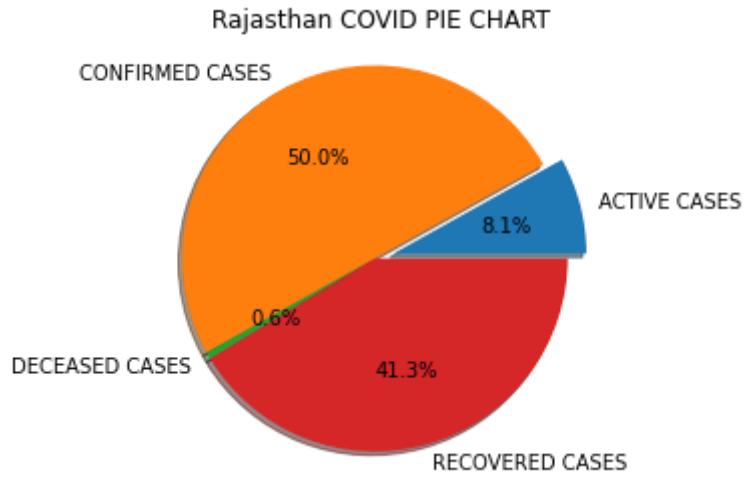



```
fig=plt.figure(figsize=(10,7))
```

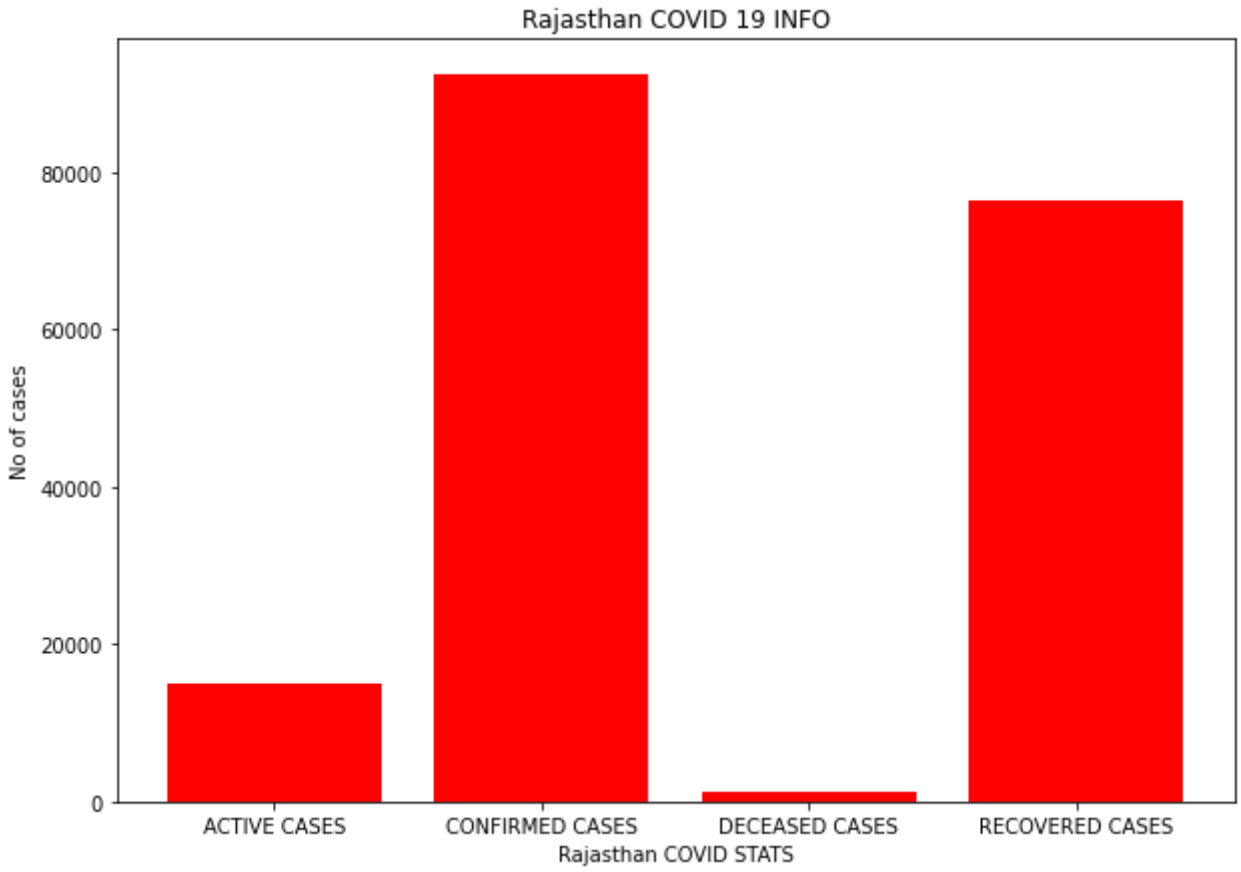
```
plt.bar(sub,value27,color='red')
#plt.yticks(value)
plt.xlabel("Puducherry COVID STATS")
plt.ylabel("No of cases")
plt.title("Puducherry COVID 19 INFO")
plt.show()
```



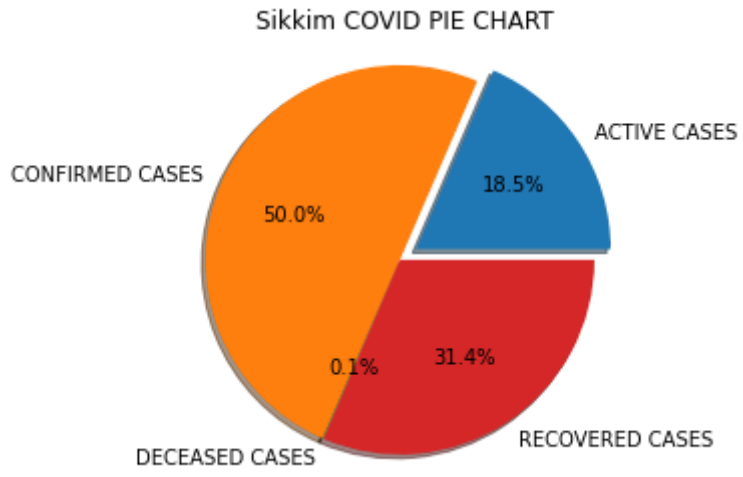

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value28=[Rajasthan_act,Rajasthan_con,Rajasthan_dec,Rajasthan_rec]
explode=(0.1,0,0,0)
plt.pie(value28,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Rajasthan COVID PIE CHART")
plt.show()
```



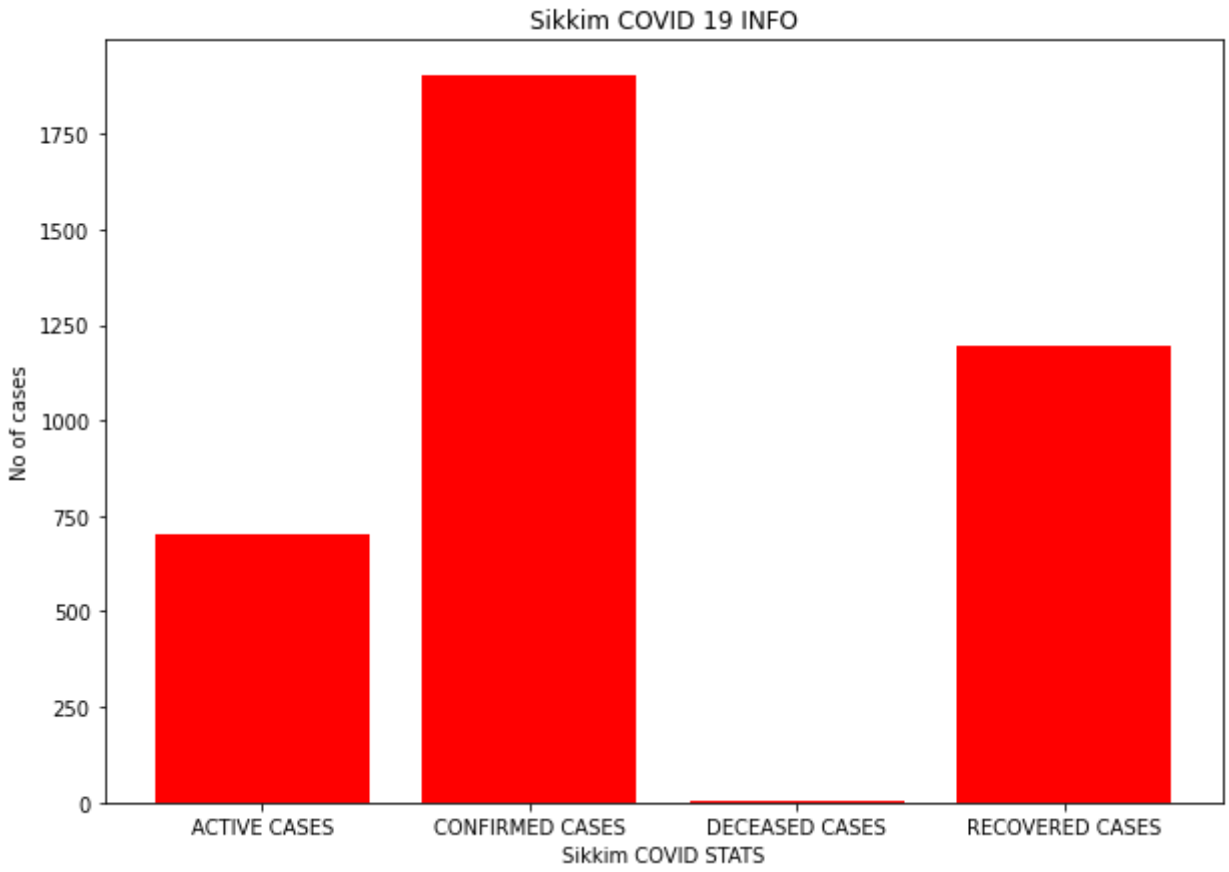
```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value28,color='red')
#plt.yticks(value)
plt.xlabel("Rajasthan COVID STATS")
plt.ylabel("No of cases")
plt.title("Rajasthan COVID 19 INFO")
plt.show()
```



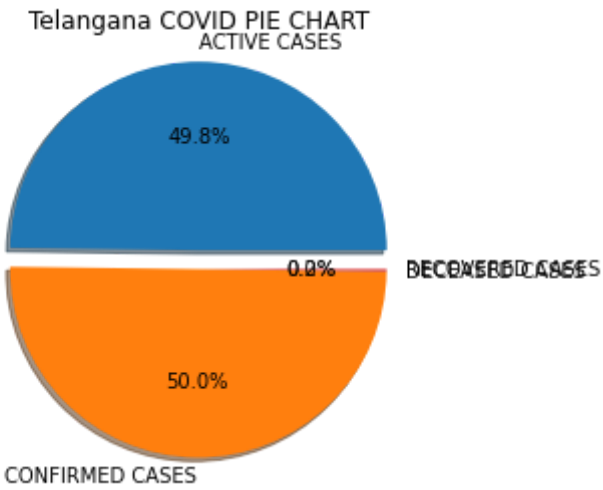

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value29=[Sikkim_act,Sikkim_con,Sikkim_dec,Sikkim_rec]
explode=(0.1,0,0,0)
plt.pie(value29,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Sikkim COVID PIE CHART")
plt.show()
```



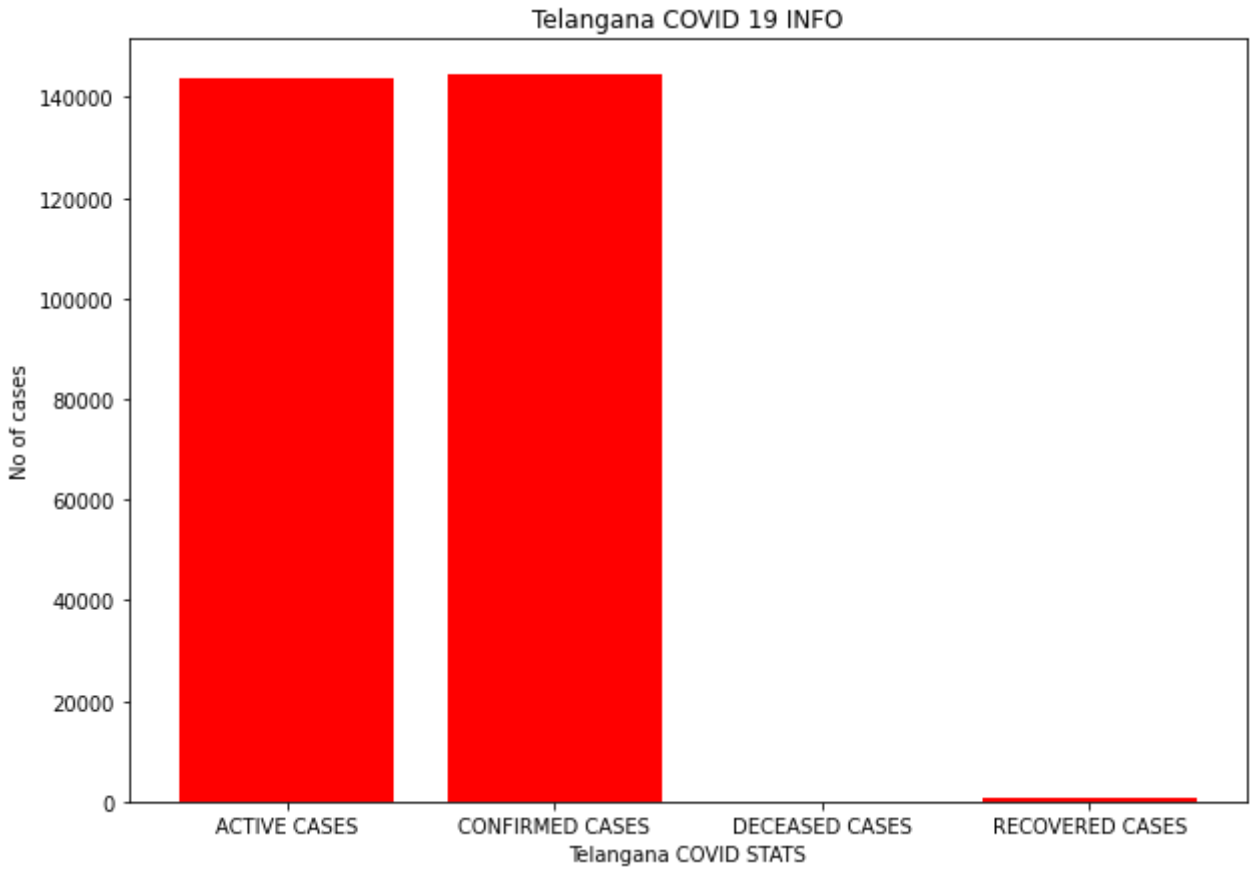
```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value29,color='red')
#plt.yticks(value)
plt.xlabel("Sikkim COVID STATS")
plt.ylabel("No of cases")
plt.title("Sikkim COVID 19 INFO")
plt.show()
```




```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value30=[Telangana_act,Telangana_con,Telangana_dec,Telangana_rec]
explode=(0.1,0,0,0)
plt.pie(value30,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Telangana COVID PIE CHART")
plt.show()
```

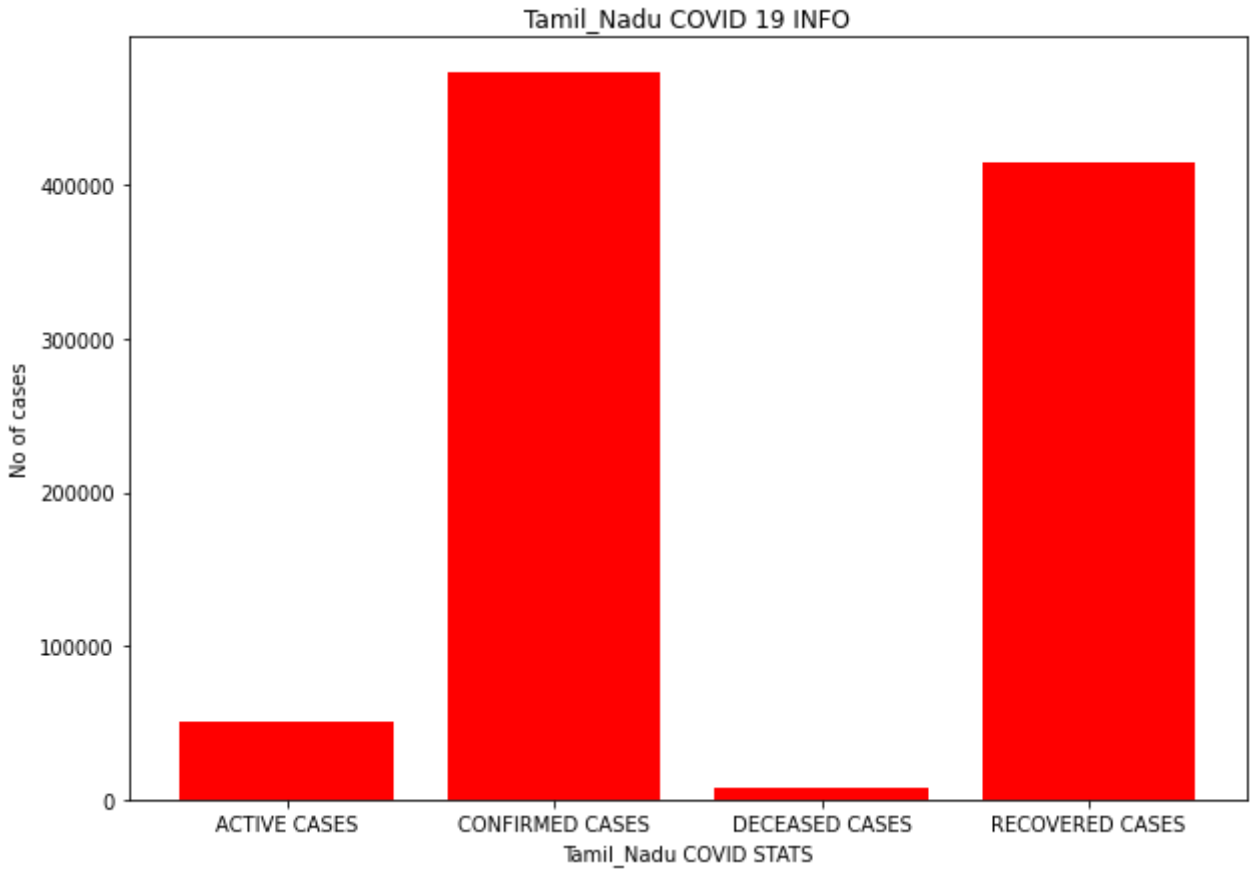


```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value30,color='red')
#plt.yticks(value)
plt.xlabel("Telangana COVID STATS")
plt.ylabel("No of cases")
plt.title("Telangana COVID 19 INFO")
plt.show()
```



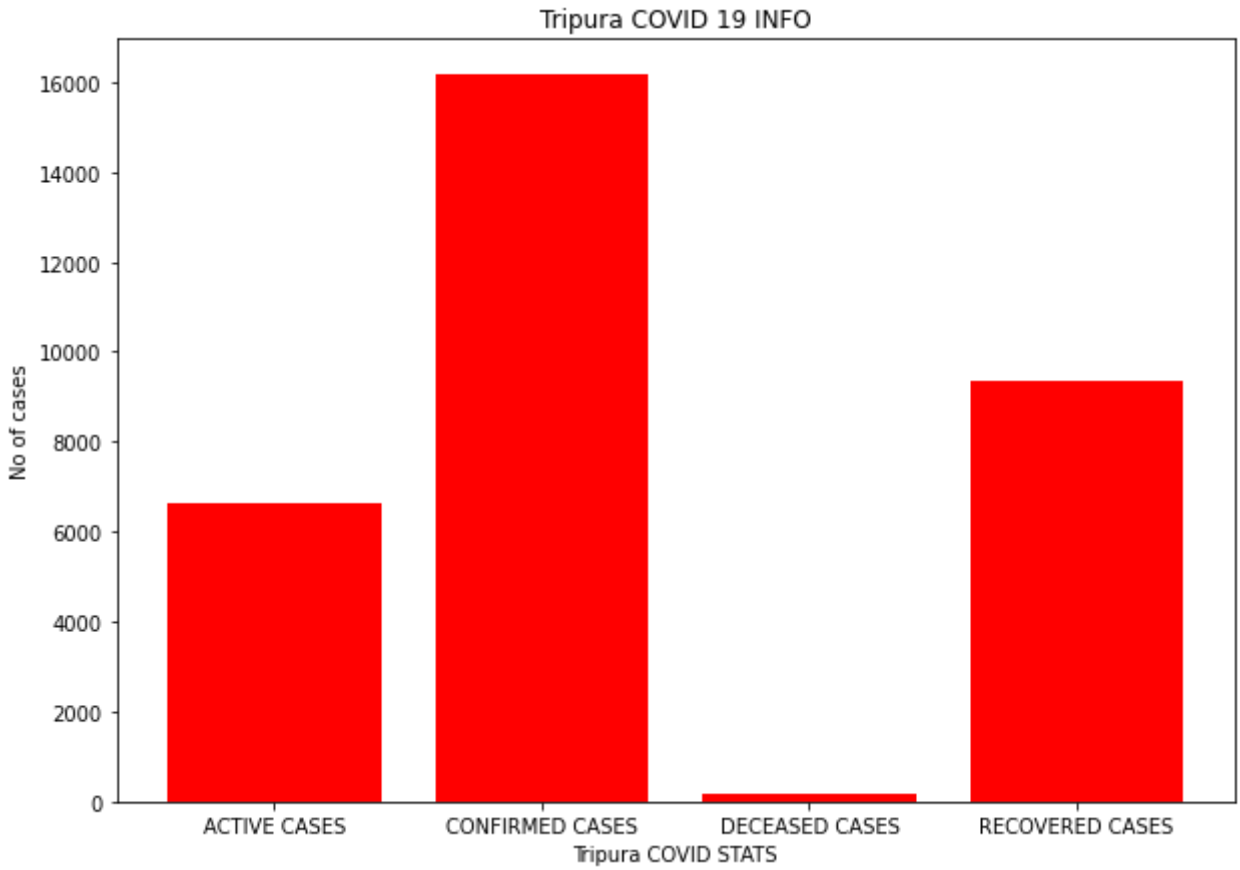

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value31=[Tamil_Nadu_act,Tamil_Nadu_con,Tamil_Nadu_dec,Tamil_Nadu_rec]
explode=(0.1,0,0,0)
plt.pie(value31,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Tamil_Nadu COVID PIE CHART")
plt.show()
```

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value31,color='red')
#plt.yticks(value)
plt.xlabel("Tamil_Nadu COVID STATS")
plt.ylabel("No of cases")
plt.title("Tamil_Nadu COVID 19 INFO")
plt.show()
```




```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value32=[Tripura_act,Tripura_con,Tripura_dec,Tripura_rec]
explode=(0.1,0,0,0)
plt.pie(value32,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Tripura COVID PIE CHART")
plt.show()
```

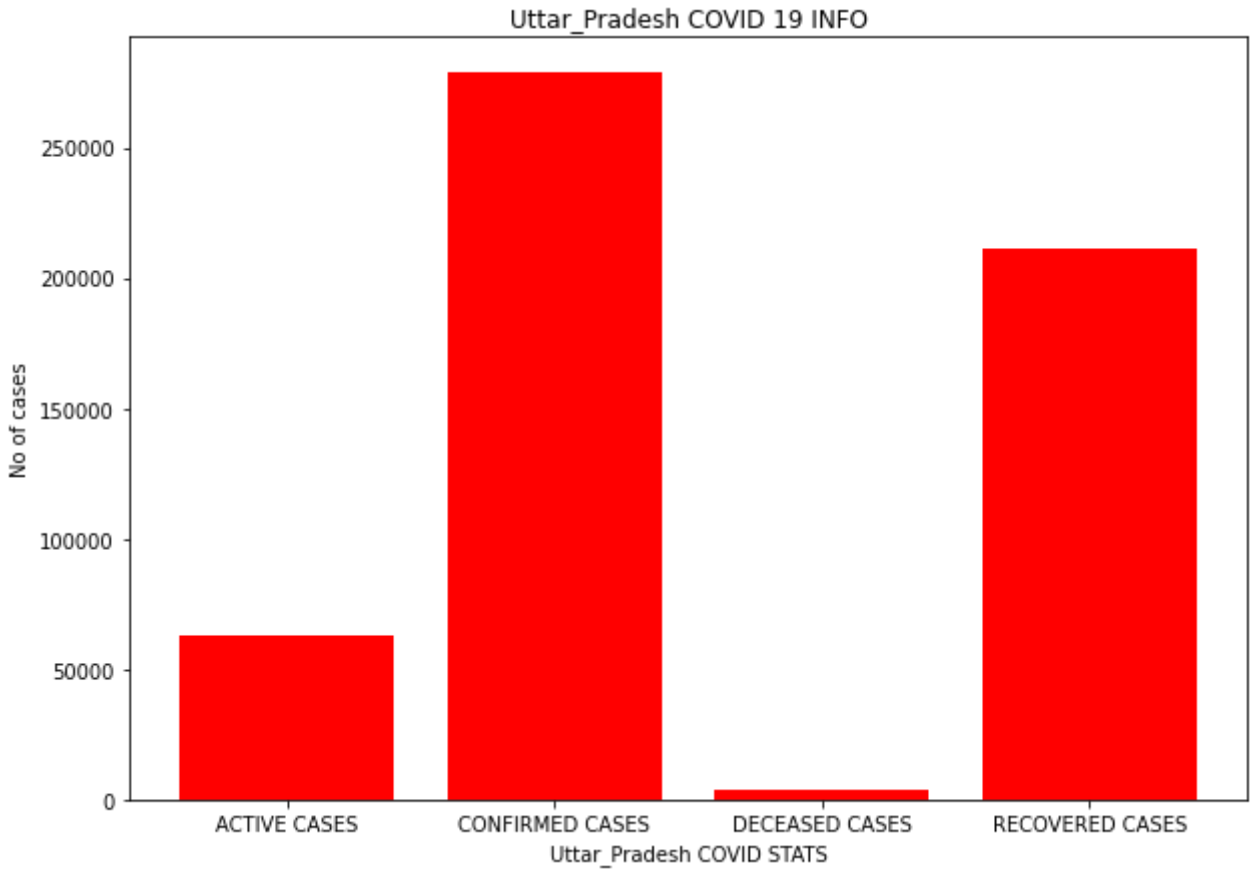

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value32,color='red')
#plt.yticks(value)
plt.xlabel("Tripura COVID STATS")
plt.ylabel("No of cases")
plt.title("Tripura COVID 19 INFO")
plt.show()
```




```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value33=[Uttar_Pradesh_act,Uttar_Pradesh_con,Uttar_Pradesh_dec,Uttar_Pradesh_rec]
explode=(0.1,0,0,0)
plt.pie(value33,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Uttar_Pradesh COVID PIE CHART")
plt.show()
```

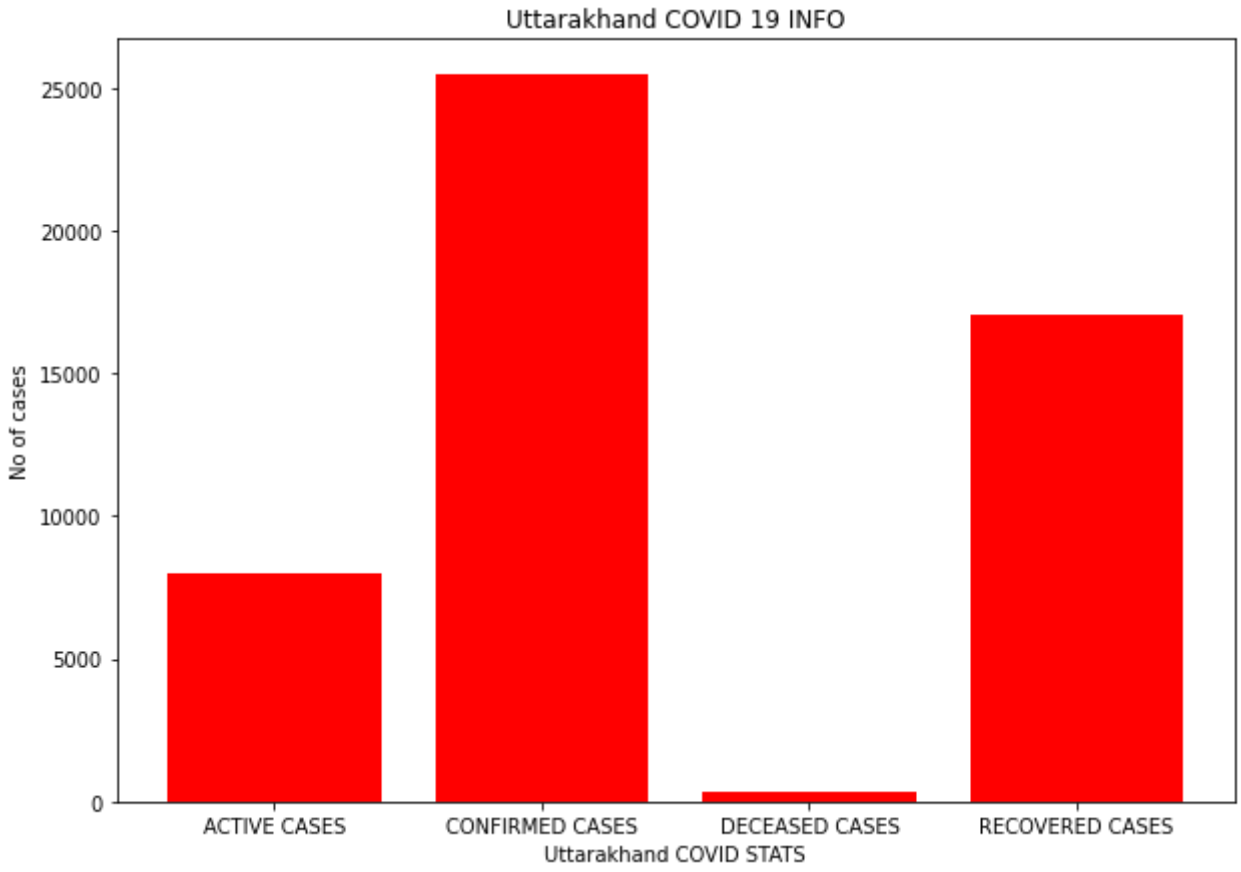
Uttar_Pradesh COVID PIE CHART

```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value33,color='red')
#plt.yticks(value)
plt.xlabel("Uttar_Pradesh COVID STATS")
plt.ylabel("No of cases")
plt.title("Uttar_Pradesh COVID 19 INFO")
plt.show()
```



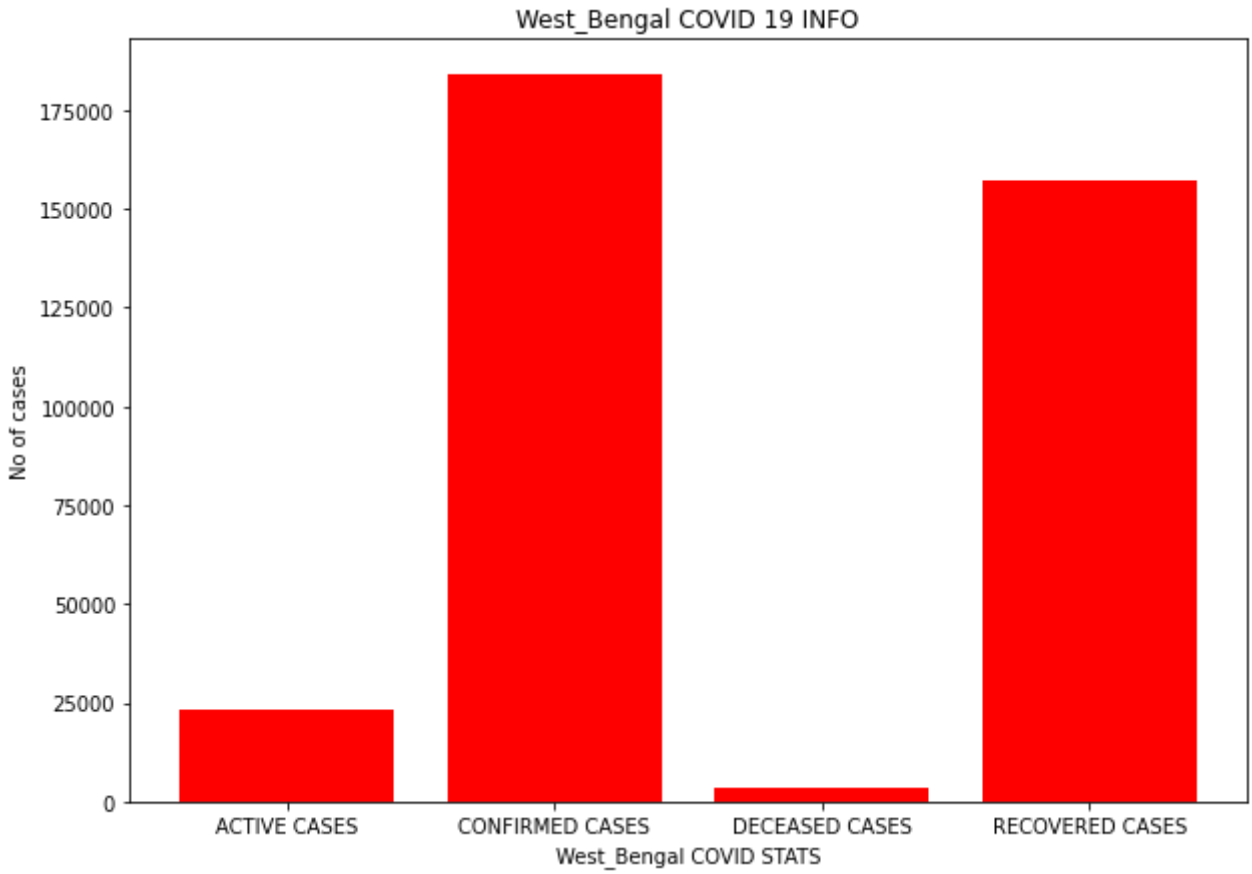

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value34=[Uttarakhand_act,Uttarakhand_con,Uttarakhand_dec,Uttarakhand_rec]
explode=(0.1,0,0,0)
plt.pie(value34,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Uttarakhand COVID PIE CHART")
plt.show()
```


```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value34,color='red')
#plt.yticks(value)
plt.xlabel("Uttarakhand COVID STATS")
plt.ylabel("No of cases")
plt.title("Uttarakhand COVID 19 INFO")
plt.show()
```



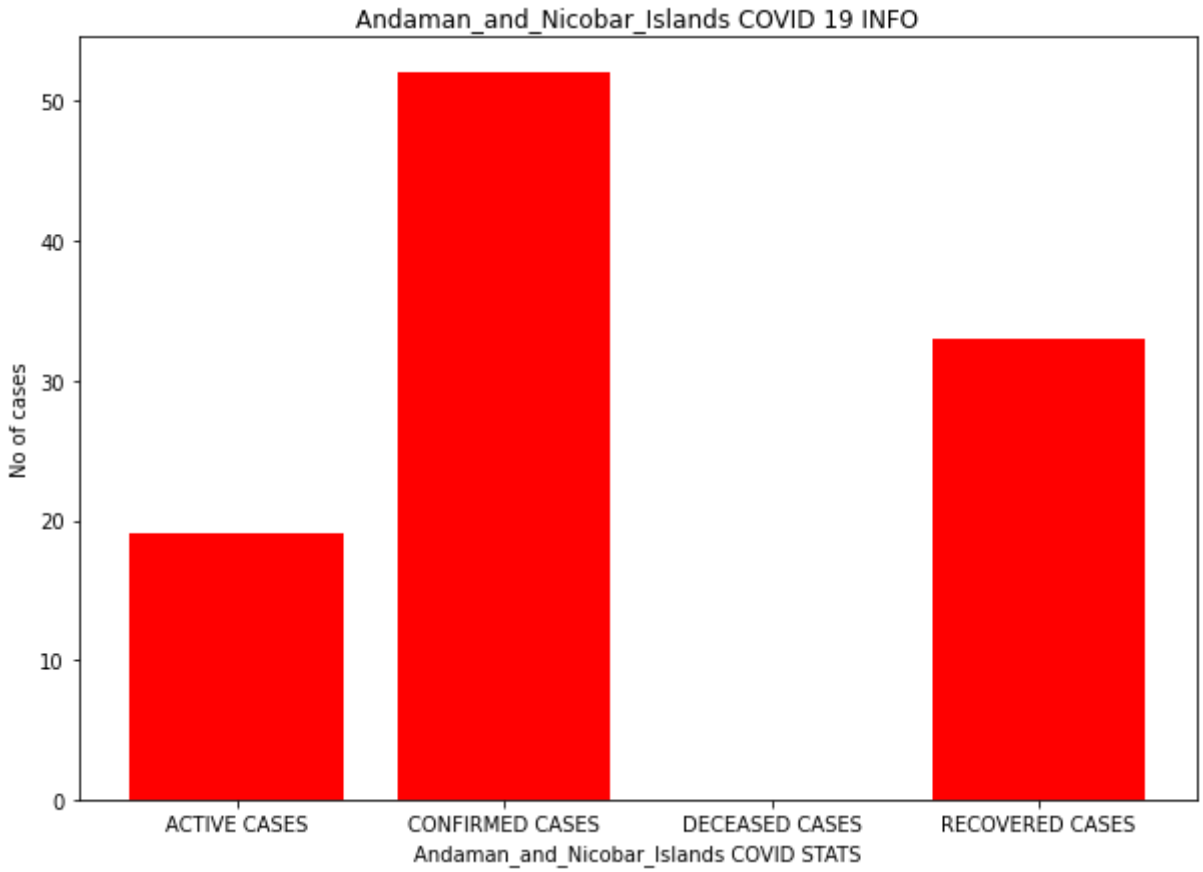

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value35=[West_Bengal_act,West_Bengal_con,West_Bengal_dec,West_Bengal_rec]
explode=(0.1,0,0,0)
plt.pie(value35,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("West_Bengal COVID PIE CHART")
plt.show()
```


```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value35,color='red')
#plt.yticks(value)
plt.xlabel("West_Bengal COVID STATS")
plt.ylabel("No of cases")
plt.title("West_Bengal COVID 19 INFO")
plt.show()
```



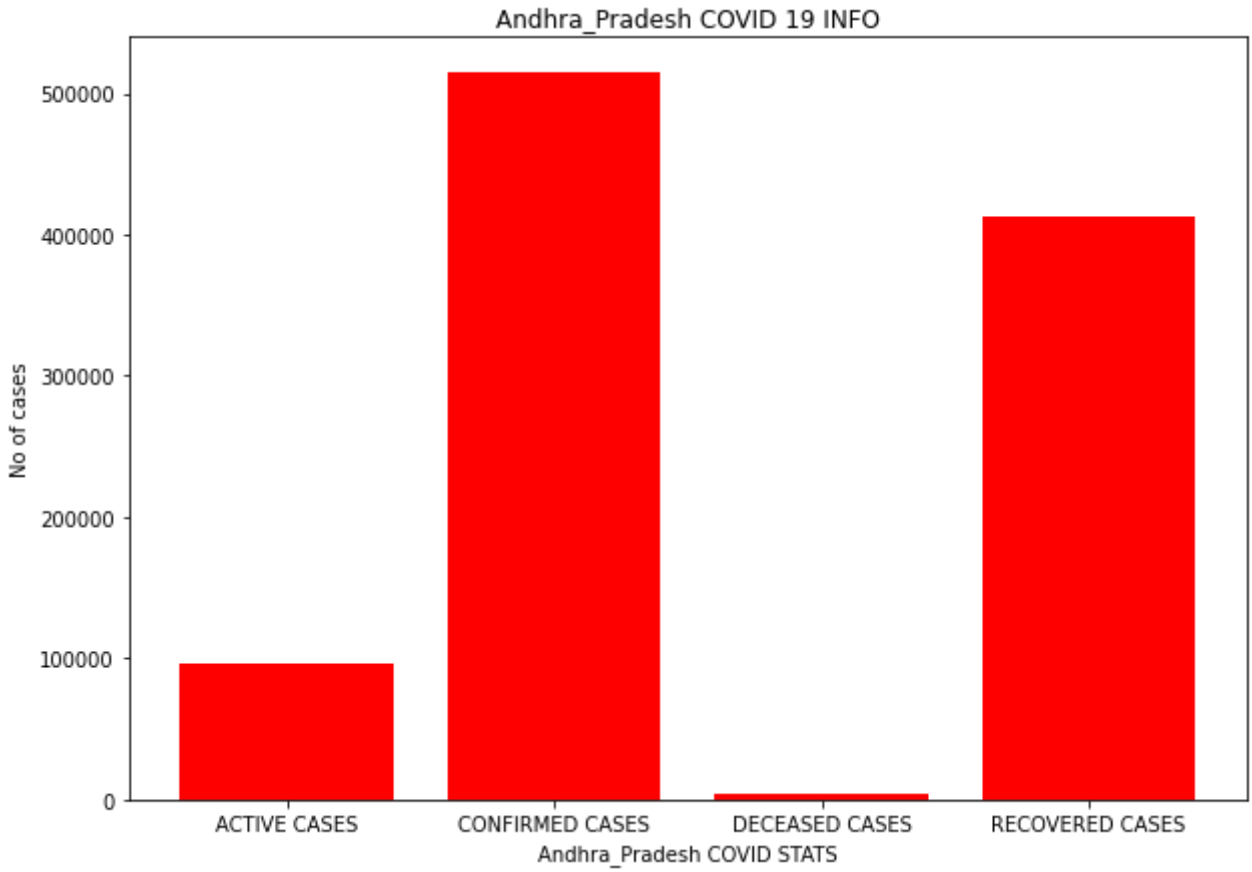

```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value36=[Andaman_and_Nicobar_Islands_act,Andaman_and_Nicobar_Islands_con,Andaman_and_Nicob
explode=(0.1,0,0,0)
plt.pie(value36,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Andaman_and_Nicobar_Islands COVID PIE CHART")
plt.show()
```


```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value36,color='red')
#plt.yticks(value)
plt.xlabel("Andaman_and_Nicobar_Islands COVID STATS")
plt.ylabel("No of cases")
plt.title("Andaman_and_Nicobar_Islands COVID 19 INFO")
plt.show()
```




```
sub=["ACTIVE CASES","CONFIRMED CASES","DECEASED CASES","RECOVERED CASES"]
value37=[Andhra_Pradesh_act,Andhra_Pradesh_con,Andhra_Pradesh_dec,Andhra_Pradesh_rec]
explode=(0.1,0,0,0)
plt.pie(value37,explode=explode,labels=sub,autopct='%1.1f%%',shadow=True)
plt.axis('equal')
plt.title("Andhra_Pradesh COVID PIE CHART")
plt.show()
```


```
fig=plt.figure(figsize=(10,7))
plt.bar(sub,value37,color='red')
#plt.yticks(value)
plt.xlabel("Andhra_Pradesh COVID STATS")
plt.ylabel("No of cases")
plt.title("Andhra_Pradesh COVID 19 INFO")
plt.show()
```




# INDIAN STATE-WISE CASES COMPARISON

```
val=[value2,value3,value4,value5,value6,value7,value8,value9,value10,value11+value12,value
print(len(val))
```

```
36
```

```
tactive=[]
trecovered=[]
tdecreased=[]
tconfimred=[]
for i in range(0,36):
    tactive.append(val[i][0])
    trecovered.append(val[i][3])
    tdecreased.append(val[i][2])
```

```
    tconfimred.append(val[i][1])
```

## List of names

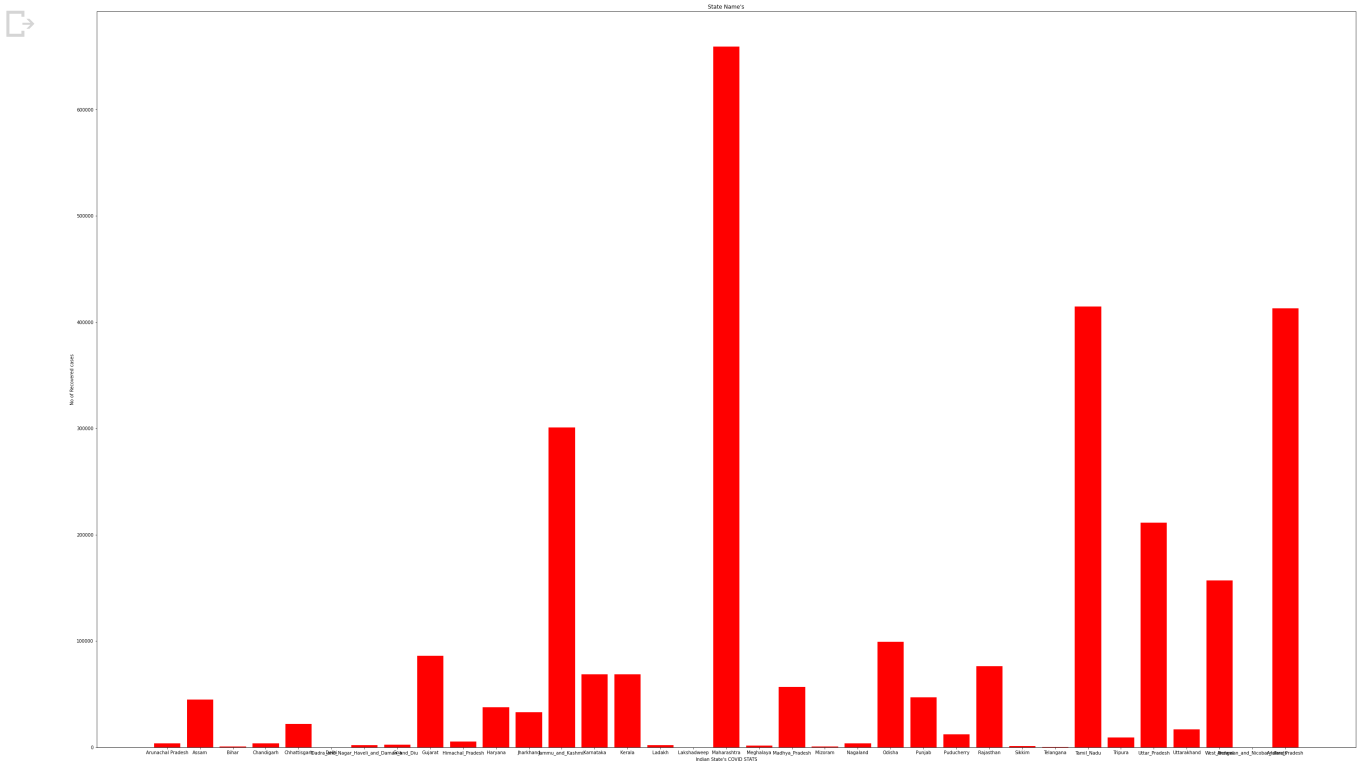
```
tsub=["Arunachal Pradesh","Assam","Bihar","Chandigarh","Chhattisgarh","Delhi","Dadra_and_N
```

### *ACTIVE CASES*

```
fig=plt.figure(figsize=(50,30))
plt.bar(tsub,tactive,color='red')
#plt.yticks(value)
plt.xlabel("Indian State's COVID STATS")
plt.ylabel("No of Active cases")
plt.title("State Name's")
plt.show()
```

### *Recovered cases*

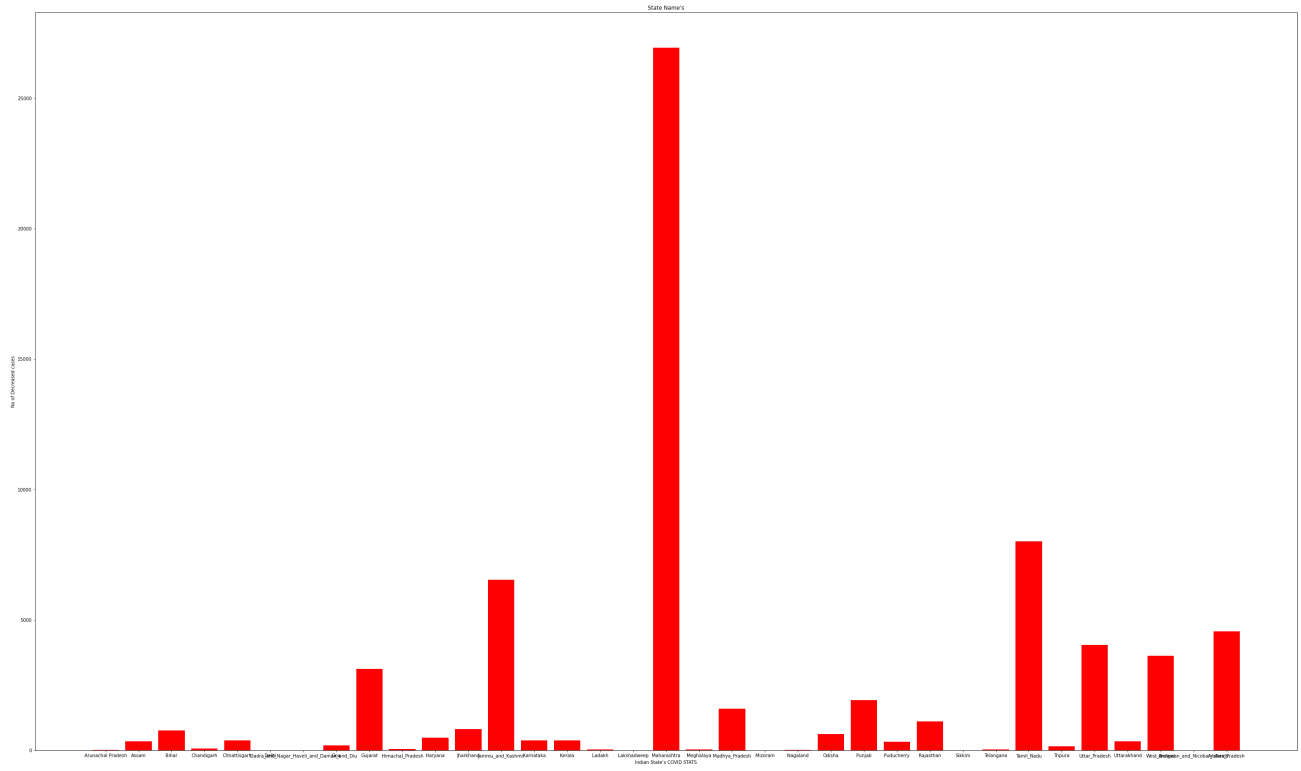
```
fig=plt.figure(figsize=(50,30))
plt.bar(tsub,trecovered,color='red')
#plt.yticks(value)
plt.xlabel("Indian State's COVID STATS")
plt.ylabel("No of Recovered cases")
plt.title("State Name's")
plt.show()
```




### *Decreased cases*

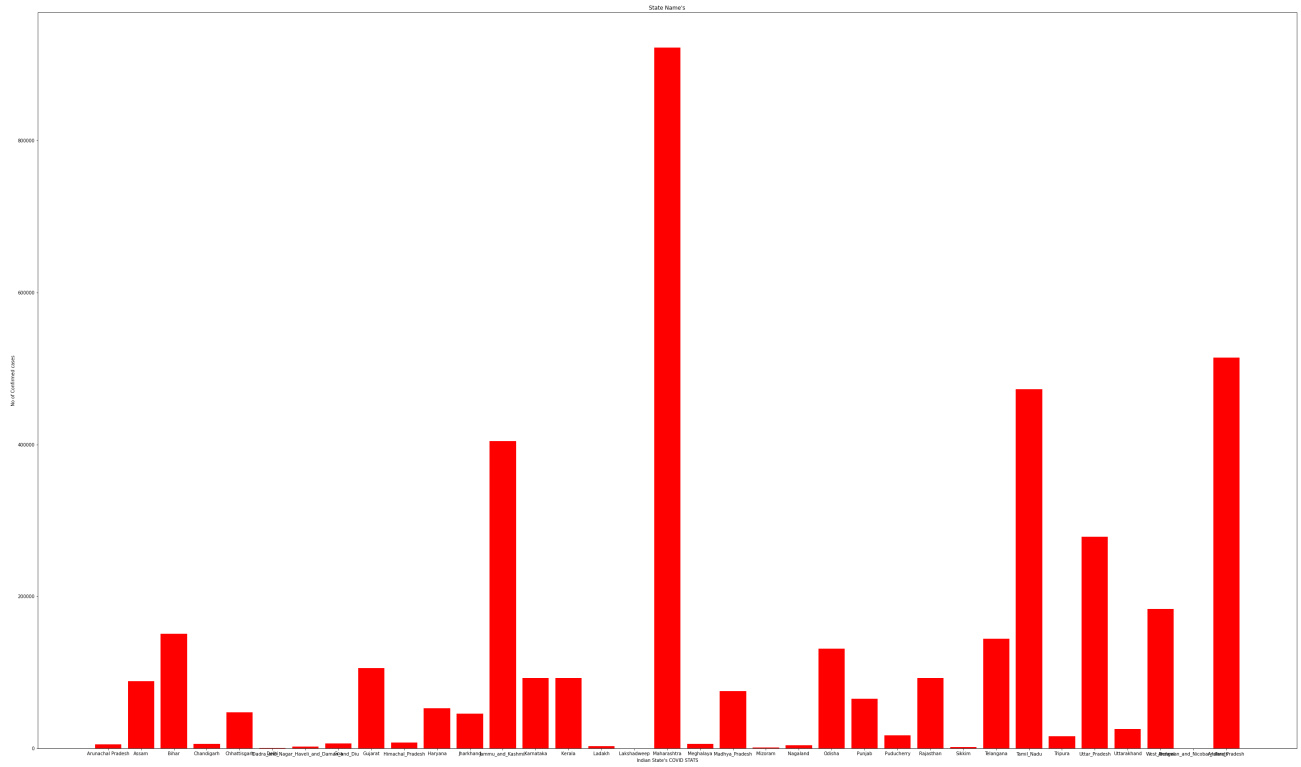
```
fig=plt.figure(figsize=(50,30))
plt.bar(tsub,tdecreased,color='red')
#plt.yticks(value)
plt.xlabel("Indian State's COVID STATS")
```

```
plt.ylabel("No of Decreased cases")
plt.title("State Name's")
plt.show()
```




### *Confirmed cases*

```
fig=plt.figure(figsize=(50,30))
plt.bar(tsub,tconfimred,color='red')
#plt.yticks(value)
plt.xlabel("Indian State's COVID STATS")
plt.ylabel("No of Confirmed cases")
plt.title("State Name's")
plt.show()
```




# IMPORT PLOTLY FOR MAPS

```
import plotly.graph_objects as go
import plotly.express as px


map_active = go.Scattermapbox(
        customdata=d.loc[:,['ACTIVE CASES',"CONFIRMED CASES","DECEASED CASES","RECOVERED C
        name='ACTIVE CASES',
        lon=d['longitude'],
        lat=d['Latitude'],
        mode='markers',
        text=d['District'],
        hovertemplate=
        "<b>%{text}</b><br><br>" +
        "ACTIVE: %{customdata[0]}<br>" +
        "<extra></extra>",
        fillcolor='mediumturquoise',
        showlegend=True,
```

```
        marker=go.scattermapbox.Marker(
            size=10,
            color='Red',
            opacity=1
        ),
        opacity=0.5,

    )


map_confirmed = go.Scattermapbox(
        customdata=d.loc[:,['ACTIVE CASES',"CONFIRMED CASES","DECEASED CASES","RECOVERED C
        name='CONFIRMED CASES',
        lon=d['longitude'],
        lat=d['Latitude'],
        mode='markers',
        text=d['District'],
        hovertemplate=
        "<b>%{text}</b><br><br>" +
        "CONFIRMED : %{customdata[1]}<br>" +
        "<extra></extra>",
        fillcolor='mediumturquoise',
        showlegend=True,

        marker=go.scattermapbox.Marker(
            size=10,
            color='YELLOW',
            opacity=1
        ),
        opacity=0.5,

    )


import numpy as np


map_deceased = go.Scattermapbox(
        customdata=d.loc[:,['ACTIVE CASES',"CONFIRMED CASES","DECEASED CASES","RECOVERED C
        name='DECEASED CASES',
        lon=d['longitude'],
        lat=d['Latitude'],
        mode='markers',
        text=d['District'],
        hovertemplate=
        "<b>%{text}</b><br><br>" +
        "DECEASED : %{customdata[2]}<br>" +
        "<extra></extra>",
        fillcolor='mediumturquoise',
        showlegend=True,

        marker=go.scattermapbox.Marker(
            size=10,
            color="Green",
            opacity=1,
        ),
```

```
        opacity=0.5,

    )


map_recovered = go.Scattermapbox(
        customdata=d.loc[:,['ACTIVE CASES',"CONFIRMED CASES","DECEASED CASES","RECOVERED C
        name='RECOVERED CASES',
        lon=d['longitude'],
        lat=d['Latitude'],
        mode='markers',
        text=d['District'],
        hovertemplate=
        "<b>%{text}</b><br><br>" +
        "RECOVERED : %{customdata[3]}<br>" +
        "<extra></extra>",
        fillcolor='mediumturquoise',
        showlegend=True,

        marker=go.scattermapbox.Marker(
            size=10,
            color="BLUE",
            opacity=1,
        ),
        opacity=0.5,

    )
```

**Maplayer **

```
   layout = go.Layout(
        height=800,
        mapbox_style="stamen-watercolor",
        autosize=True,
        #mapbox_layers=[
           # {
               # "below": 'traces',
               # "sourcetype": "raster",
               # "source": [
               #     "https://basemap.nationalmap.gov/arcgis/rest/services/USGSImageryOnly

               # ]
            #}
        #],'''
        font=dict(
            family="Courier New, monospace",
            size=18,
            color="#7f7f7f"

        ),
        paper_bgcolor='rgba(0,0,0,0)',
        plot_bgcolor='rgba(0,0,0,0)'
    )
```

```
from plotly.subplots import make_subplots
fig = make_subplots(rows=2, cols=2, start_cell="bottom-left")
```

## SET MAPBOX STYLE HAS OPEN STREET VIEW TO SEE NEAR BY HOSPITALS

```
data = [map_active,map_confirmed,map_deceased,map_recovered]

fig = go.Figure(data=data, layout=layout)
fig.update_layout(title='COVID 19 REAL-TIME REPORT <br>BY NAVEEN')
fig.update_layout(mapbox_style="open-street-map")

fig.show()
```

COVID 19 REAL-TIME REPORT

```
print(d['ACTIVE CASES'].describe())
```

```
count      727.000000
mean      1365.825309
std       4050.996043
min          0.000000
25%        158.000000
50%        412.000000
75%       1100.500000
max      61781.000000
Name: ACTIVE CASES, dtype: float64
```

# INSTALLING DASH TO SHARE YOUR DASH BOARD'S

```
!pip install dash
```

```
Requirement already satisfied: dash in /usr/local/lib/python3.6/dist-packages (1.16.
Requirement already satisfied: Flask>=1.0.2 in /usr/local/lib/python3.6/dist-package
Requirement already satisfied: future in /usr/local/lib/python3.6/dist-packages (fro
Requirement already satisfied: dash-table==4.10.1 in /usr/local/lib/python3.6/dist-p
Requirement already satisfied: dash-renderer==1.8.0 in /usr/local/lib/python3.6/dist
Requirement already satisfied: dash-html-components==1.1.1 in /usr/local/lib/python3
Requirement already satisfied: dash-core-components==1.12.0 in /usr/local/lib/python
Requirement already satisfied: plotly in /usr/local/lib/python3.6/dist-packages (fro
Requirement already satisfied: flask-compress in /usr/local/lib/python3.6/dist-packa
Requirement already satisfied: Jinja2>=2.10.1 in /usr/local/lib/python3.6/dist-packa
Requirement already satisfied: Werkzeug>=0.15 in /usr/local/lib/python3.6/dist-packa
Requirement already satisfied: itsdangerous>=0.24 in /usr/local/lib/python3.6/dist-p
Requirement already satisfied: click>=5.1 in /usr/local/lib/python3.6/dist-packages
Requirement already satisfied: six in /usr/local/lib/python3.6/dist-packages (from p
Requirement already satisfied: retrying>=1.3.3 in /usr/local/lib/python3.6/dist-pack
Requirement already satisfied: brotli in /usr/local/lib/python3.6/dist-packages (fro
Requirement already satisfied: MarkupSafe>=0.23 in /usr/local/lib/python3.6/dist-pac
```

```
%cd ..
```

```
/content/grive
```

```
%cd ..
```

```
/content
```

# *TO SEE OUTPUT IN COLAB YOU NEED TO DO LOCAlhost TUNNELING*

> Using ngrok

```
%%sh
# get ngrok
curl -O https://bin.equinox.io/c/4VmDzA7iaHb/ngrok-stable-linux-amd64.zip
unzip ngrok-stable-linux-amd64.zip
```

```
Archive:  ngrok-stable-linux-amd64.zip
  % Total    % Received % Xferd  Average Speed   Time    Time     Time  Current
                                 Dload  Upload   Total   Spent    Left  Speed
100 13.1M  100 13.1M    0     0  9796k      0  0:00:01  0:00:01 --:--:-- 9796k
replace ngrok? [y]es, [n]o, [A]ll, [N]one, [r]ename:  NULL
(EOF or read error, treating as "[N]one" ...)
```

```
sleep(30)
```

```
# launch ngrok
get_ipython().system_raw('./ngrok http 8050 &')
sleep(20)
```

Click NGROK CLICK TO SEE OUTPUT AFTER USING DASH

```
EG LINK-https://c321da9a394e.ngrok.io
```

```
%%sh
# get url with ngrok
curl -s http://localhost:4040/api/tunnels | python3 -c "import sys, json; print(json.load(
```

```
https://5a082b5ab977.ngrok.io
```

```
sleep(20)
```

Running Dash On Colab

> Now After running Dash (below cell) Share the above ngrok link and keep the tunnel running So that other can access & share the link

```
import dash
import dash_core_components as dcc
import dash_html_components as html

app = dash.Dash()
app.layout = html.Div([
    dcc.Graph(figure=fig)

])
if __name__ == '__main__':
```

```
app.run_server(debug=False)
```

```
Dash is running on http://127.0.0.1:8050/

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 * Serving Flask app "__main__" (lazy loading)
 * Environment: production
   WARNING: This is a development server. Do not use it in a production deployment.
   Use a production WSGI server instead.
 * Debug mode: off
 * Running on http://127.0.0.1:8050/ (Press CTRL+C to quit)
```