NIGERIA COVID-19 REPORT USING PANDAS

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DATA ANALYST ¶

In [270]:

```
import pandas as pd
import numpy as np
import seaborn as sns
from datetime import date
import matplotlib.pyplot as plt
%matplotlib inline
plt.style.use('ggplot')
```

In [271]:

```
import requests
```

In [272]:

```
url ='https://covid19.ncdc.gov.ng/'
```

In [251]:

```
data_url = requests.get(url)
```

In [252]:

```
data_url
```

Out[252]:

```
<Response [200]>
```

In [253]:

```
covid_data = pd.read_html(data_url.text)
```

In [254]:

```
len(covid_data), type(covid_data)
```

Out[254]:

```
(1, list)
```

In [255]:

```
covid_data = covid_data[0]
```

In [256]:

```
covid_naijadata = covid_data.iloc[:,0:]
```

In [258]:

```
covid_naijadata.head()
```

Out[258]:

	States Affected	No. of Cases (Lab Confirmed)	No. of Cases (on admission)	No. Discharged	No. of Deaths
0	Lagos	3357	2688	627	42
1	Kano	883	714	133	36
2	FCT	469	312	143	14
3	Katsina	308	243	51	14
4	Borno	250	84	141	25

In [259]:

```
#RENAMING OF COLUMNS

headers = [line.lower().replace(' ', '_').replace('no._of_cases_(lab_confirmed)','cases
_confirmed').replace('no._of_cases_(on_admission)','cases_on_addmission').replace('.',
'') for line in covid_naijadata.columns]
covid_naijadata.columns = headers
covid_naijadata.head()
```

Out[259]:

	states_affected	cases_confirmed	cases_on_addmission	no_discharged	no_of_deaths
0	Lagos	3357	2688	627	42
1	Kano	883	714	133	36
2	FCT	469	312	143	14
3	Katsina	308	243	51	14
4	Borno	250	84	141	25

TOTAL CONFIRMED CASES

In [260]:

```
TOTAL_CONFIRMED_CASES = covid_naijadata.cases_confirmed.sum()
f"The total number of confirmed CORONAVIRUS CASES in Nigeria is {TOTAL_CONFIRMED_CASES}
."
```

Out[260]:

```
'The total number of confirmed CORONAVIRUS CASES in Nigeria is 7526.'
```

ACTIVE CASES

In [261]:

```
TOTAL_CASES_ON_ADDMISSION = covid_naijadata.cases_on_addmission.sum()
f"The total number of CORONAVIRUS CASES on addmission in Nigeria is {TOTAL_CASES_ON_ADD
MISSION}."
```

Out[261]:

```
'The total number of CORONAVIRUS CASES on addmission in Nigeria is 5131.'
```

TOTAL NUMBER OF DISCHARGED PERSONS

In [262]:

```
TOTAL_NUMBER_OF_DISCHARGED_PERSONS = covid_naijadata.no_discharged.sum()
f"The total number of discharged person from CORONAVIRUS in Nigeria is {TOTAL_NUMBER_OF
_DISCHARGED_PERSONS}."
```

Out[262]:

```
'The total number of discharged person from CORONAVIRUS in Nigeria is 217
4.'
```

TOTAL DEATHS

In [263]:

```
TOTAL_DEATHS = covid_naijadata.no_of_deaths.sum()
f"The total number of death due to CORONAVIRUS in Nigeria is {TOTAL_DEATHS}."
```

Out[263]:

```
'The total number of death due to CORONAVIRUS in Nigeria is 221.'
```

NUMBER OF AFFECTED STATES

In [264]:

```
STATES_AFFECTED = covid_naijadata['states_affected'].value_counts().sum()
f"The total number of states affected by CORONAVIRUS in Nigeria is {STATES_AFFECETD}."
```

Out[264]:

```
'The total number of states affected by CORONAVIRUS in Nigeria is 35.'
```

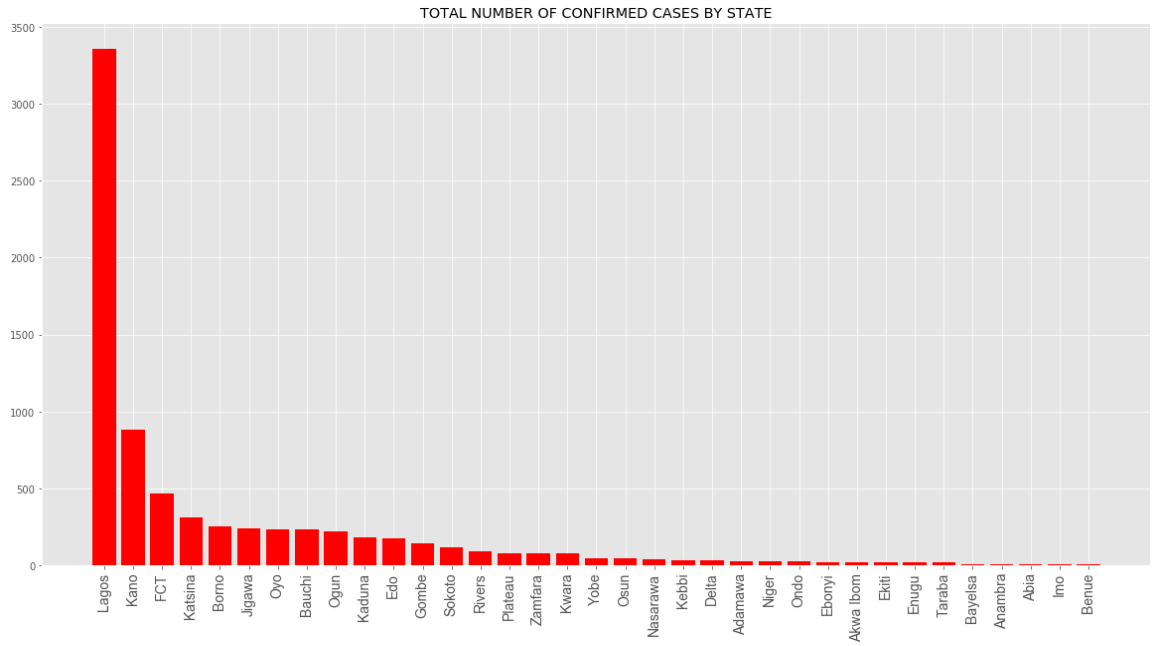
TOTAL NUMBER OF CONFIRMED CASES BY STATE

In [265]:

```
plt.figure(figsize=(20,10))
plt.bar(x=covid_naijadata['states_affected'], height = covid_naijadata['cases_confirmed'],color='red')
plt.xticks(rotation=90, family='Arial', size=14)
plt.title('TOTAL NUMBER OF CONFIRMED CASES BY STATE')
```

Out[265]:

```
Text(0.5, 1.0, 'TOTAL NUMBER OF CONFIRMED CASES BY STATE')
```



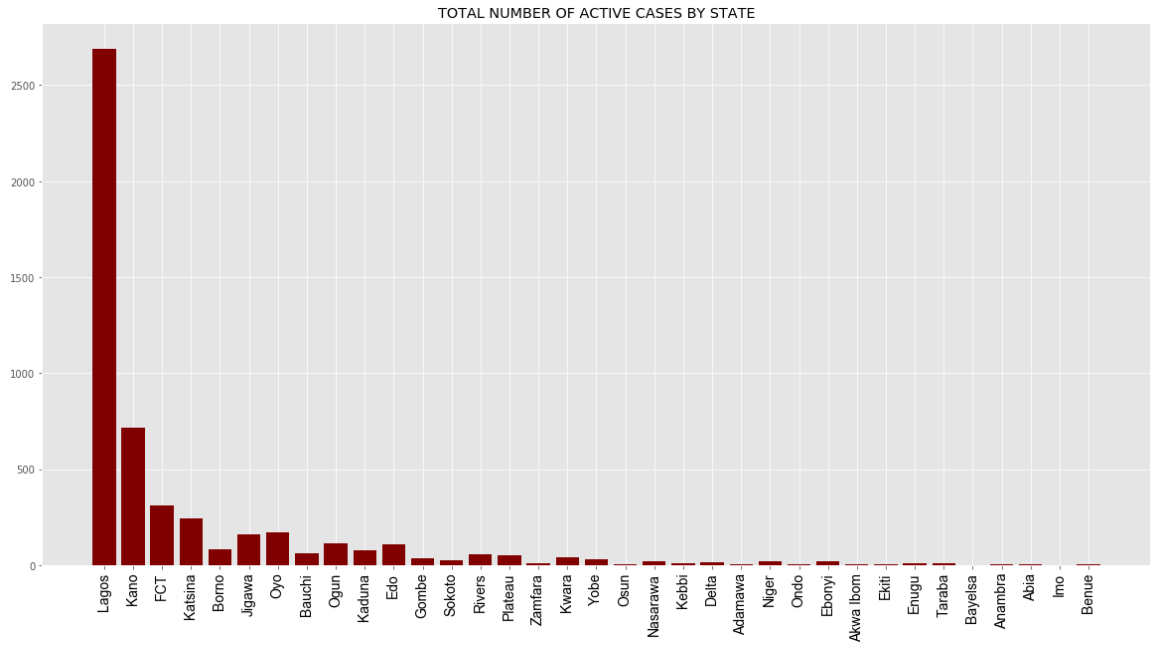
TOTAL NUMBER OF ACTIVE CASES BY STATE

In [266]:

```
plt.figure(figsize=(20,10))
plt.bar(x=covid_naijadata['states_affected'], height = covid_naijadata['cases_on_addmis
sion'], color='maroon')
plt.xticks(rotation=90, family='Arial', color='black', size=14)
plt.title('TOTAL NUMBER OF ACTIVE CASES BY STATE')
```

Out[266]:

```
Text(0.5, 1.0, 'TOTAL NUMBER OF ACTIVE CASES BY STATE')
```



TOTAL NUMBER OF DEATH BY STATE

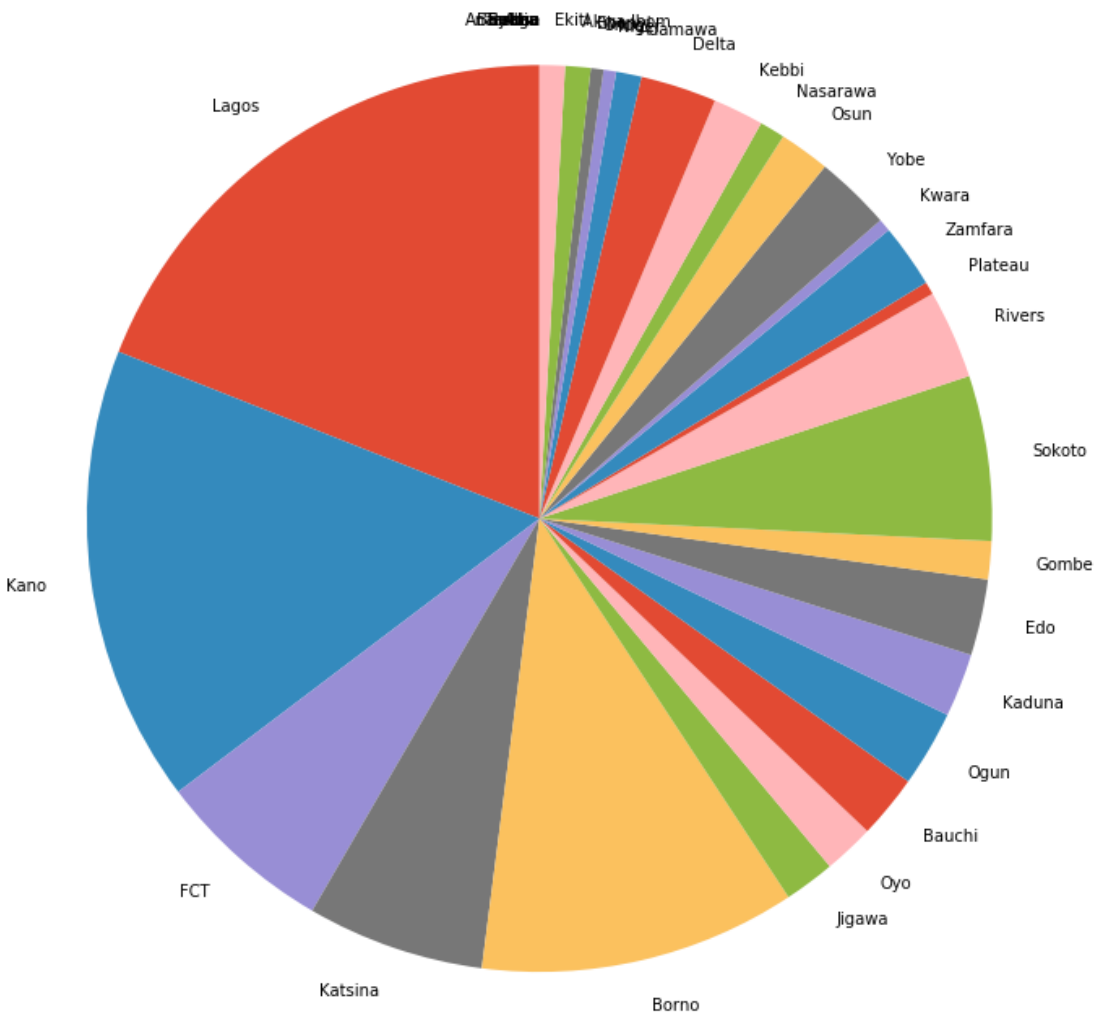
In [267]:

```
death_view=covid_naijadata[['states_affected', 'no_of_deaths']]
```

In [268]:

```
plt.figure(figsize=(10,30))
# Create a pie chart
plt.pie(
    # using data total)arrests
    death_view['no_of_deaths'],
    # with the labels being officer names
    labels=death_view['states_affected'],
    # with no shadows
    shadow=False,
    # with the start angle at 90%
    startangle=90,
    )


# View the plot
plt.tight_layout()
plt.show()
```



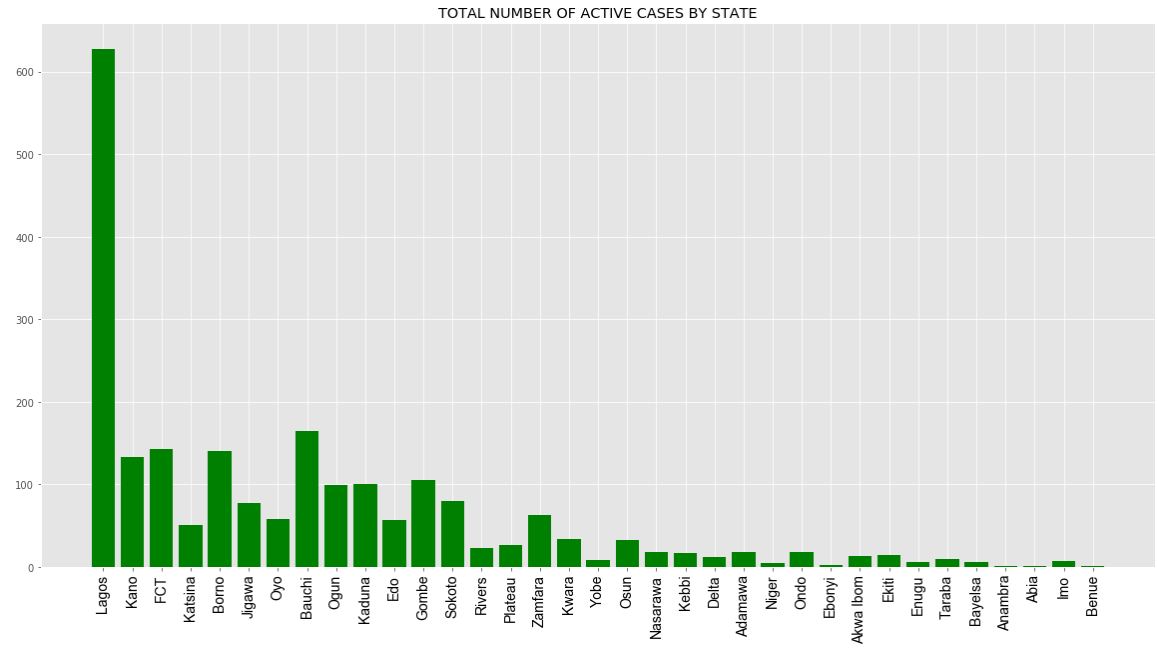
TOTAL NUMBER OF ACTIVE CASES BY STATE

In [273]:

```
plt.figure(figsize=(20,10))
plt.bar(x=covid_naijadata['states_affected'], height = covid_naijadata['no_discharged'
], color='green')
plt.xticks(rotation=90, family='Arial', color='black', size=14)
plt.title('TOTAL NUMBER OF ACTIVE CASES BY STATE')
```

Out[273]:

```
Text(0.5, 1.0, 'TOTAL NUMBER OF ACTIVE CASES BY STATE')
```



In [ ]: