

Capstone Project-1 Global Terrorism Analysis

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Points of Discussion:

- 1. The Problem Statement
- 2. Summary of the Experience Set
- 3. Trend of Attacks with Year
- 4. Type of Attack
- 5. Affected Countries
- 6. Top Terrorist Organizations

- 7. Types of Weapons Used
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- 9. Kind of People Targeted
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The Problem Statement

We are provided with the Global Terrorism Database (GTD), an open-source database including information on terrorist attacks around the world from 1970 through 2017. The GTD includes systematic data on domestic as well as international terrorist incidents that have occurred during this time period and now includes more than 180,000 attacks. The task is to explore and analyze the data to discover key findings pertaining to terrorist activities.



Summary of the Experience Set:

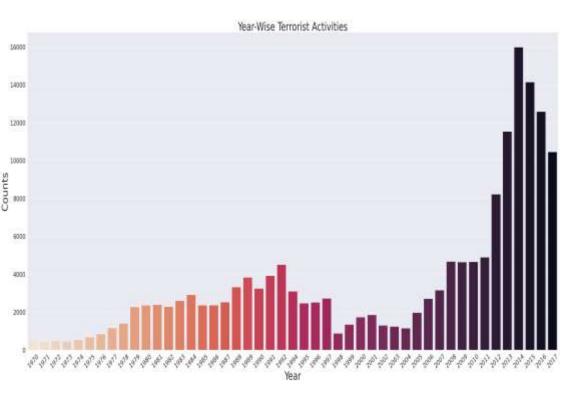
Here, the dataset has 1,81,691 rows, from the Year-1970 to 2017, out of which 14146 entries (rows) are duplicates means 1,67,545 are the actual terrorist activities happened worldwide.

It has 135 columns, means each experience is registered along 135 features or dimensions.

We are interested in 13 features among them and perform EDA on those features.



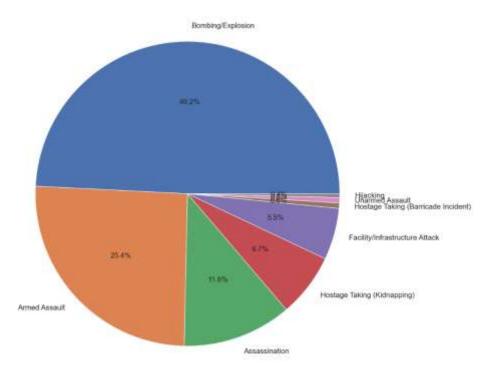
Trend of Attacks with Year:



As we can see, Year-2014 saw the highest no. of terrorist activities (around 16000 incidents)



Type of Attack:

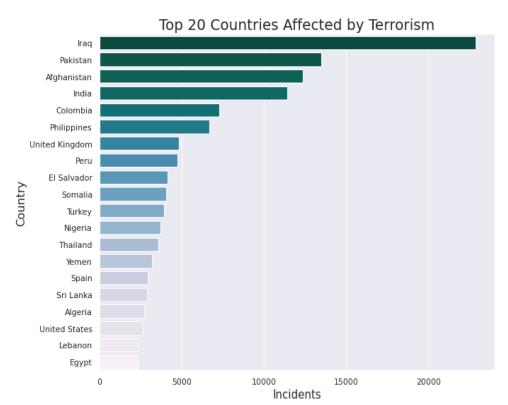


Around 49.2% of Total attacks are executed through Bombing/Explosions, followed by Armed Assault and Assassination

Bombing/Explosion	79098
Armed Assault	40902
Assassination	18629
Hostage Taking (Kidnapping)	10837
Facility/Infrastructure Attack	8797
Hostage Taking (Barricade Incident)	913
Unarmed Assault	912
Hijacking	649



Affected Countries:

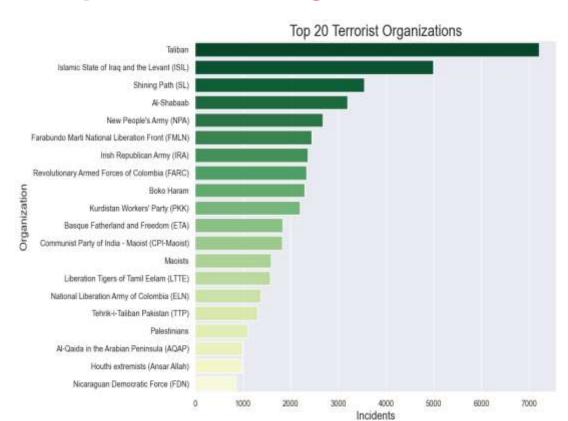


Most terrorist activities happened in Iraq, more than 25,000 incidents.

India stands 4th ,around 12,000 incidents



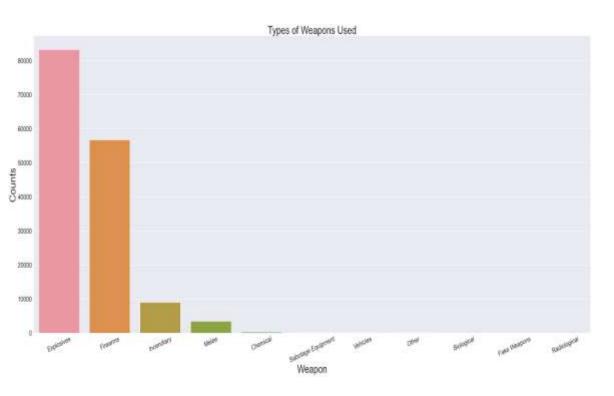
Top Terrorist Organizations:



Taliban is responsible for more than 7000 terrorist activities, followed by ISIL and Shining Path.



Types of Weapons Used:

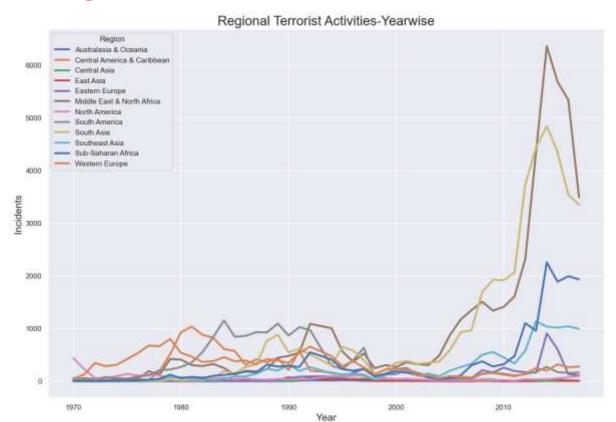


Explosives are used as primary weapon (more than 80000 times), followed by Firearms(Guns)

83240 56771
56771
9013
3510
308
135
135
110
35
33
7



Regions Affected:



As we can see,

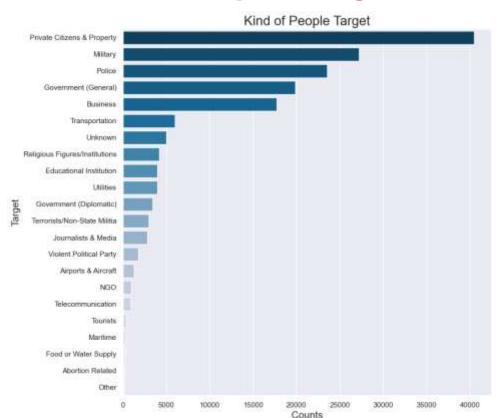
Middle East and North

Africa(Dark Brown line) is the most affected region,
followed by South Asia

Middle East & North Africa	47444
South Asia	42811
Sub-Saharan Africa	16760
South America	15792
Western Europe	14540
Southeast Asia	11804
Central America & Caribbean	8771
Eastern Europe	4932
North America	3192
East Asia	680
Central Asia	549
Australasia & Oceania	270



Kind of People Targeted:

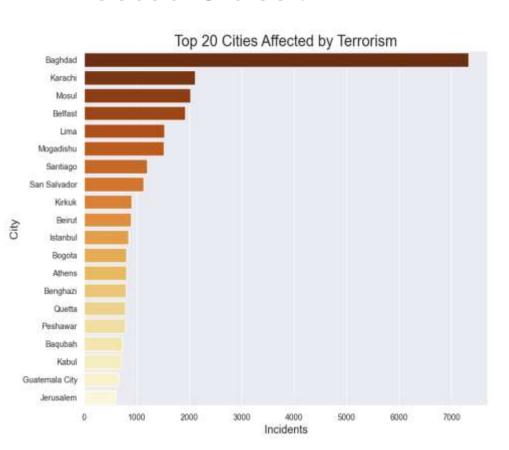


Private Citizens and Property are the primary targets (more than 40,000 counts), followed by Military and Police

Private Citizens & Property	40464
Military	27240
Police	23519
Government (General)	19893
Business	17753
Transportation	5986
Unknown	5025
Religious Figures/Institutions	4181
Educational Institution	3997
Utilities	3952
Government (Diplomatic)	3405
Terrorists/Non-State Militia	2977
Journalists & Media	2816
Violent Political Party	1770
Airports & Aircraft	1303
NGO	948
Telecommunication	886
Tourists	424
Maritime	337
Food or Water Supply	294
Abortion Related	244
Other	131



Affected Cities:

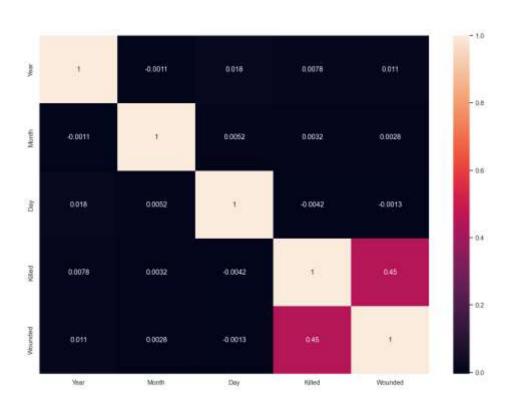


Baghdad, the capital of Iraq, is the most affected city(7000+ incidents), followed by Karachi (a city in Pakistan) and Mosul.

Baghdad	7326
Karachi	2112
Mosul	2028
Belfast	1927
Lima	1526
Mogadishu	1521
Santiago	1199
San Salvador	1130
Kirkuk	903
Beirut	890
Istanbul	840
Bogota	801
Athens	800
Benghazi	790
Quetta	789
Peshawar	784
Baqubah	725
Kabul	718
Guatemala City	654
Jerusalem	604



Co-relation among Features



From the heatmap we can see there is no high positive or negative co-relation between the features and no conclusions can be made.

Only 'Killed' and 'Wounded' are co-related, because people who got wounded initially may succumbed to death afterwards.



Final Conclusion:

Middle east and North Africa is the most affected region by Terrorism. These regions are known for their resources for e.g., North Africa for Diamonds and Middle East for Petroleum Resources.

This clearly indicates that all the terrorist gangs are unitedly working towards capturing the world's best geographical locations to rule the world.