## HW6

THE ACLED Project reports information on politically violents event sin unstable and warring states. More information can be found in the dataset description (http://www.acleddata.com/wp-content/uploads/2015/01/ACLED Codebook 2015.pdf).

Each entry in the data is an event that occurred. Listed below are the columns, as well as the number of unique values each column has.

**GWNO**: 50

EVENT\_ID\_CNTY: 104227 EVENT\_ID\_NO\_CNTY: 99549

EVENT\_DATE: 6663

YEAR: 6

TIME\_PRECISION: 3
EVENT\_TYPE: 10
ACTOR1: 2700

ALLY\_ACTOR\_1: 2219

INTER1: 8 ACTOR2: 2306

ALLY\_ACTOR\_2: 1586

INTER2:9

INTERACTION: 43
COUNTRY: 50
ADM\_LEVEL\_1: 405
ADM\_LEVEL2: 339
ADM\_LEVEL\_3: 1030
LOCATION: 1846
LATITUDE: 14090
LNGITUDE: 14285

SOURCE: 9251 NOTES: 77263 FATALITIES: 243

GEO PRECISION: 4

### Statistics:

• **Fatalities**: The mean is 6, with a standard deviation of 98, with a range from 0 to 25000. More than half of events tend to end with no fatalities (67760/106700), with 110543 events with 1, 4699 with 2, 2727 with 3. The frequency of fatality counts tend to decrease as the fatality count grows higher.

- Event Type: There are 9 event types. Below is listed the occurrences of each. As you can see, Battle, Violence against civilians, and Riots/protests are the top 3 with similar numbers.
  - Battle-No change of territory: 31223
  - Violence against civilians: 29977
  - o Riots/Protests: 24046
  - Non-violent activity by a conflict actor: 6915
  - o Remote violence: 5851
  - Non-violent transfer of territory: 2030
  - o Battle-Government regains territory: 1767
  - Battle-Non-state actor overtakes territory: 1693
  - Headquarters or base established: 726

#### Actors:

- Actor 1: Seems to be mostly militaristic groups. Below is the top occurences
  - Unidentified Armed Group (Somalia): 4376
  - Military Forces of Somalia (2012-): 2497
  - ZANU-PF: Zimbabwe African National Union-Patriotic Front: 2413
  - Protesters (Egypt): 2359
  - Military Forces of Angola (1975-): 2347
  - Protesters (South Africa): 2247
  - Al Shabaab : 2176
  - Military Forces of Democratic Republic of Congo (2001-): 1958
  - LRA: Lord's Resistance Army: 1910
  - RUF: Revolutionary United Front : 1729
  - Military Forces of Ethiopia (1991-): 1704
  - Military Forces of Sudan (1989-): 1604
  - Unidentified Armed Group (Nigeria): 1573
  - Rioters (South Africa): 1536
  - Rioters (Egypt): 1405
- Actor 2: Seems to be mostly civilians.
  - Civilians (Somalia):4357
  - Civilians (Zimbabwe):3970
  - Civilians (Democratic Republic of Congo): 2815
  - Al Shabaab:2752
  - Civilians (Nigeria):2641
  - UNITA: National Union for the Total Independence of Angola :2461
  - Civilians (Sudan): 2326
  - Unidentified Armed Group (Somalia):2013
  - Civilians (Sierra Leone):1981
  - LRA: Lord's Resistance Army :1753
  - Military Forces of Somalia (2004-2012):1517
  - Civilians (Kenya):1436

■ Police Forces of Egypt (2011-): 1259

■ Military Forces of Sudan (1989-):1257

■ Civilians (Burundi):1153

• **Country**: Most events seem to focus in the same countries. Here are the top ten occurring out of 50

o Somalia: 15834

Democratic Republic of Congo :9103

Nigeria:7406
 Sudan : 6878
 Egypt :6205

Zimbabwe: 5156South Africa: 4959Sierra Leone: 4583

Kenya :4450Uganda :4415

# Missing values

Out of the above columns, the following have significant amount of missing values

ALLY\_ACTOR\_1: 88748

ACTOR2: 1514

ALLY\_ACTOR\_2: 95024 ADM\_LEVEL\_2: 100030 ADM\_LEVEL\_3:: 1002827

NOTES: 10929 SOURCE: 187 FATALITIES: 4478

Interestingly enough, this can tell us a little bit about the data already. There are about 106700 entries in total. The missing values for ALLY\_ACTOR1 suggest that the instigators tend not to ally with other groups (75% of the time). We also see that a small, but still signficant, portion of the incidents lack an ACTOR2, meaning that violent events were not committed against another political group, and even those that did lacked ALLY\_ACTOR2.

Note: ADM\_LEVEL\_2, ADM\_LEVEL\_3 can be mostly ignored, as they are the secnond and third largest subnational regions in which the event took place, and ADM\_LEVEL\_1 should be enough for most of our analysis.

## **Possible hypotheses**

Medium-low casualty events tend to occur in the same geographic location, while higher casualty events tend to be more geographically widespread.

Actors tend to have similar fatality counts across events.

Events where a militaristic group and non-militaristic group are involved tend to have more fatalities.

There exists a correlation between geographic location and cause of event (for example, if in the notes it specifiys water related issues, then they would cluster around particular areas)