**Title**

West Africa Ebola Epidemic

**Summary**

This data set was collected by the World Health Organization during the 2013-2016 West Africa Ebola Epidemic and contains data from Liberia, Sierra Leone, and Guinea.

**Introduction**

This data set was collected by the World Health Organization during the 2013-2016 West Africa Ebola Epidemic and contains data from Liberia, Sierra Leone and Guinea (CDC, 2019). It includes prevalence, incidence and mortality data from these countries.

Unexplained hemorrhaging along with fever, aches and pains, severe headaches, weakness and fatigue and gastrointestinal upset are some of the symptoms of the deadly disease Ebola. Ebola virus disease or Ebola is caused by one of 6 viruses in the Ebola Virus genus, four of which cause disease in humans (CDC, 2019). Ebola was first identified in 1975 near the Ebola River in Democratic Republic of Congo. Infected bats can pass the virus onto humans. Once it has passed into a human host it can be transmitted from person to person through contact with blood and body fluids of individuals with Ebola or individuals who have died from Ebola. It is one of only a few diseases that can be transmitted after the death of an individual (small pox is an example of another).

The 2014 West Africa Ebola Epidemic first case was traced to an 18 - month old boy in Guinea in December of 2013. In March of 2014, it was declared an epidemic and would eventually spread to 10 countries on three continents (CDC, 2019). However, only in Guinea, Liberia and Sierra Leone was transmission considered to be widespread. The last cases of Ebola associated with this epidemic were reported into 2016.

**About the data**

The data set was collected by the World Health Organization from the three major countries involved in the 2014 West Africa Ebola Pandemic. The data was reported by public health agencies in Sierra Leone, Guinea and Liberia from March 2014 through April 2016. The data set includes total number of cases and total deaths reported by each country.  The number of new cases was calculated by subtracting the total number of cases from the previously reported date.

The data set contains the following data:

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| --- | --- |
| **WHO Report Date** | Date in which the data was gathered |
| **Day Reported** | Number of days after the initial report was made. This provides a continuous variable for graphing programs that require this rather than the dates. |
| **Total Cases Guinea** | Total number of cases of Ebola on that date reported in Guinea since the epidemic started. |
| **New Cases Guinea** | Number of new cases since last reported date in Guinea.  This column was calculated by subtracting the total number of cases from the current date from the previous date.  All negative numbers were set to 0. |
| **Total Deaths Guinea** | Total number of deaths in Guinea since the epidemic started on that date. |
| **Total Cases Liberia** | Total number of cases of Ebola on that date reported in Liberia since the epidemic started. |
| **New Cases Liberia** | Number of new cases since last reported date in Liberia.  This column was calculated by subtracting the total number of cases from the current date from the previous date.  All negative numbers were set to 0. |
| **Total Deaths Liberia** | Total number of deaths in Liberia since the epidemic started. |
| **Total Cases Sierra Leone** | Total number of cases of Ebola on that date reported in Sierra Leone since the epidemic started. |
| **New Cases  Sierra Leone** | Number of new cases since last reported date in Sierra Leone.  This column was calculated by subtracting the total number of cases from the current date from the previous date.  All negative numbers were set to 0. |
| **Total Deaths  Sierra Leone** | Total number of deaths in Sierra Leone since the epidemic started. |
| **Total Cases** | Total number of cases of Ebola on that date reported in Guinea, Liberia and Sierra Leone since the epidemic started. |
| **New Cases** | Number of new cases since last reported date in Guinea, Liberia and Sierra Leone.  This column was calculated by subtracting the total number of cases from the current date from the previous date.  All negative numbers were set to 0. |
| **Total Deaths** | Total number of deaths in Guinea, Liberia and Sierra Leone since the epidemic. |

<https://www.cdc.gov/vhf/ebola/history/2014-2016-outbreak/case-counts.html>

**Related activity**

You can use this data set to explore the spread of the Ebola overtime using incidence, prevalence and mortality rates from three of the most affected countries in the activity “Graphing an epidemic: West Africa Ebola Epidemic”. This activity focuses on graphing epidemiological data related to the West Africa Ebola Epidemic in Guinea, Sierra Leone and Liberia.

References

Initial data obtained from: Center for Disease Control and Prevention, 2020, “Case Counts” Last updated Feb 19, 2020. <https://www.cdc.gov/vhf/ebola/history/2014-2016-outbreak/case-counts.html>

Center for Disease Control and Prevention. 2019. “What is Ebola Virus Disease” Last Updated November 5, 2019. <https://www.cdc.gov/vhf/ebola/about.html>

Center for Disease Control and Prevention. 2019. “2014-2016 Ebola Outbreak in West Africa” Last Updated March 8, 2019. <https://www.cdc.gov/vhf/ebola/history/2014-2016-outbreak/index.html>

**Credits**

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