Analysis of Guinea-Conakry Lightning Network

Session Topic: Lightning Detection Technologies

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In August of 2013, Earth Networks completed installation of a 12 sensor total lightning network covering the country of Guinea as part of a demonstration program in an African Least Developed Country (LDC) environment in a joint effort with Direction Nationale de la Meteorologique, the national department of organization of Guinea. Installations were on cell towers in partnership with CellCom Guinee. Several products have been continuously generated since that date including lightning strike locations, severe weather alert polygons based on Earth Networks' Dangerous Thunderstorm Alert, and proxy radar based on Earth Networks' PulseRad product.

Presentation on the analysis of the program will include:

- Network deployment
- System performance and up-time
- Comparison of flash detection efficiency versus the Lightning Imaging Sensor (LIS) satellite
- Effectiveness of Dangerous Thunderstorm Alerts versus ground truth reports
  Comparison of PulseRad proxy radar rainfall estimates to rain gauges