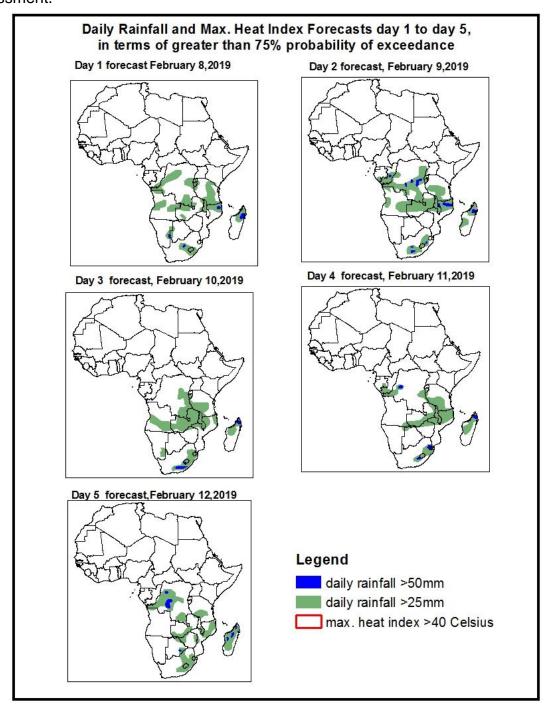
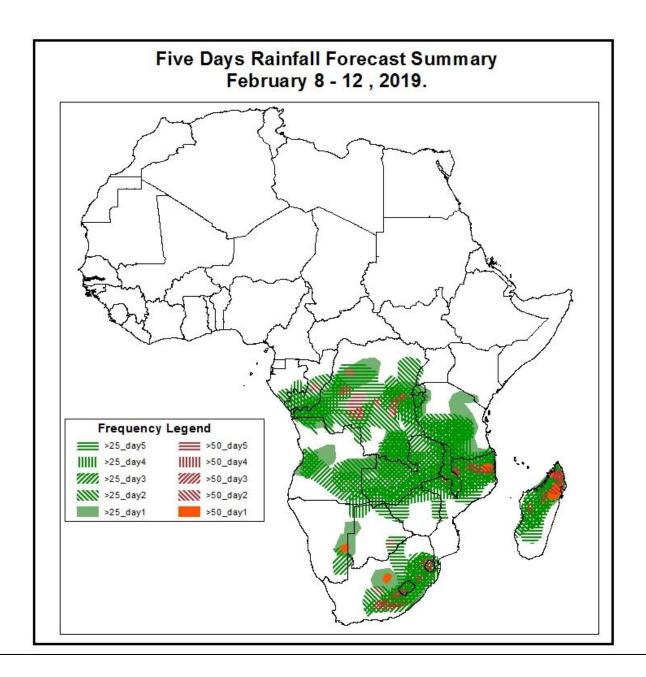
### 1. Rainfall, Heat Index and Dust Concentration Forecasts, (Issued on February 7, 2019)

### 1.1. Daily Rainfall and Maximum Heat Index Forecasts (valid: 8 - 12 February, 2019)

The forecasts are expressed in terms of high probability of precipitation (POP), valid 06Z to 06Z, and exceedance probability of maximum heat index (>40°C), based on the NCEP/GFS and the NCEP Global Ensemble Forecasts System (GEFS) and expert assessment.



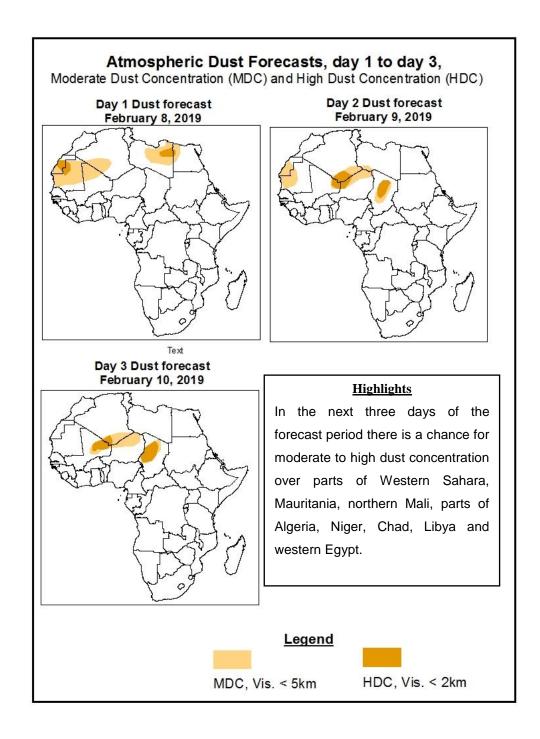


#### **Highlights**

- In the next five days, lower-level seasonal wind convergences are expected to remain active in the central Africa and the neighboring areas of the northern portions of Southern Africa.
- There is an increased chance for daily rainfall amount to exceed 50mm for 1 or more day(s) over parts of Congo Brazzaville and DRC, local areas in northern Mozambique and eastern Namibia, parts of South Africa, and northern Madagascar.
- There is a high likelihood for 2 or more days of moderate rainfall across many parts of Central Africa and portions of Southern Africa, including Madagascar.

# 1.2. Atmospheric Dust Concentration Forecasts (valid: 8 – 10 February, 2019)

The forecasts are expressed in terms of high probability of dust concentration, based on the Navy Aerosol Analysis and Prediction System, NCEP/GFS lower-level wind forecasts and expert assessment.



#### 1.3. Model Discussion, Valid: 8 - 12 February, 2019

The Azores High Pressure system over the North of Atlantic Ocean is expected to progress eastwards while its central pressure value intensifying from 1024hpa to 1031hPa during the forecast period.

The St. Helena High Pressure system over Southwest Atlantic Ocean is expected to weaken slightly as it progresses eastward with its central pressure value expected to decrease from 1024hPa to 1022hPa during the forecast period.

The Mascarene High Pressure system over Southwest Indian Ocean is expected to weaken slightly as it progresses eastwards with its central pressure value is expected to decrease from 1022hPa to 1020hPa.

At 925hPa, a broad area of dry and strong northerly to northeasterly wind is expected to prevail across Northwest and North Africa, and portions of the Sahel region, leading increased atmospheric dust concentration in the areas.

At 850hPa, a broad area of wind convergence is expected to prevail across the northern portions of Southern Africa and the neighboring areas of central Africa. Eastward propagating frontal system is also expected to enhance rainfall across parts of South Africa.

In the next five days, lower-level seasonal wind convergences are expected to remain active in the central Africa and the neighboring areas of the northern portions of Southern Africa. There is an increased chance for daily rainfall amount to exceed 50mm for 1 or more day(s) over parts of Congo Brazzaville and DRC, local areas in northern Mozambique and eastern Namibia, parts of South Africa, and northern Madagascar. There is a high likelihood for 2 or more days of moderate rainfall across many parts of Central Africa and portions of Southern Africa, including Madagascar.

### 2.0. Previous and Current Day Weather over Africa

## 2.1. Weather assessment for the previous day (February 6, 2019)

Daily rainfall totals exceeded 25mm over parts of eastern DRC, Zambia and northern Mozambique.

## 2.2. Weather assessment for the current day (February 7, 2019)

Intense convective clouds are observed over many places in central and the northern portions of Southern Africa countries, and parts of Madagascar.

