

2017 Seasonal Rainfall Prediction and Evaluation



2017

Seasonal Rainfall Prediction

INTRODUCTION

NIMET produces the Seasonal Rainfall Prediction (SRP) in fulfilment of its mandate to effectively monitor the nation's climate and weather and provide necessary early warning advisories.

The timely preparation & release of the SRP is to enhance preparedness against predicted climate risks and hazards. Thus, the SRP assists decision makers and disaster managers at the various levels of governance to put in place adaptation and mitigation strategies.

The SRP is therefore an invaluable tool which is capable of ameliorating the unpleasant consequences of extreme weather and climate events.

The proper application of the SRP reduces climate-related risks, enhances production, security and revenue generation.

GOAL OF THE SRP

NiMet seeks to use the SRP and its other key products to assist government achieve its programs in the current agricultural policy which include:

- (i) *The achievement of self-sufficiency in basic food supply and the attainment of food security;***
- (ii) *Increase in the production of agricultural raw materials for industries;***
- (iii) *Increase in the production and processing of export crops, using improved production and processing technologies;***
- (iv) *Job creation within the agricultural value chain and,***
- (v) *Improvement in the quality of life of citizens' particularly rural dwellers resulting in poverty eradication.***

Components of the 2017 SRP

Major components of the 2017 SRP include predictions of:

Onset dates of the growing season

Annual rainfall amount

Experimental Malaria Forecast

Cessation dates of the growing season

The Little Dry Season and Dry Spells

Socio-economic Implications

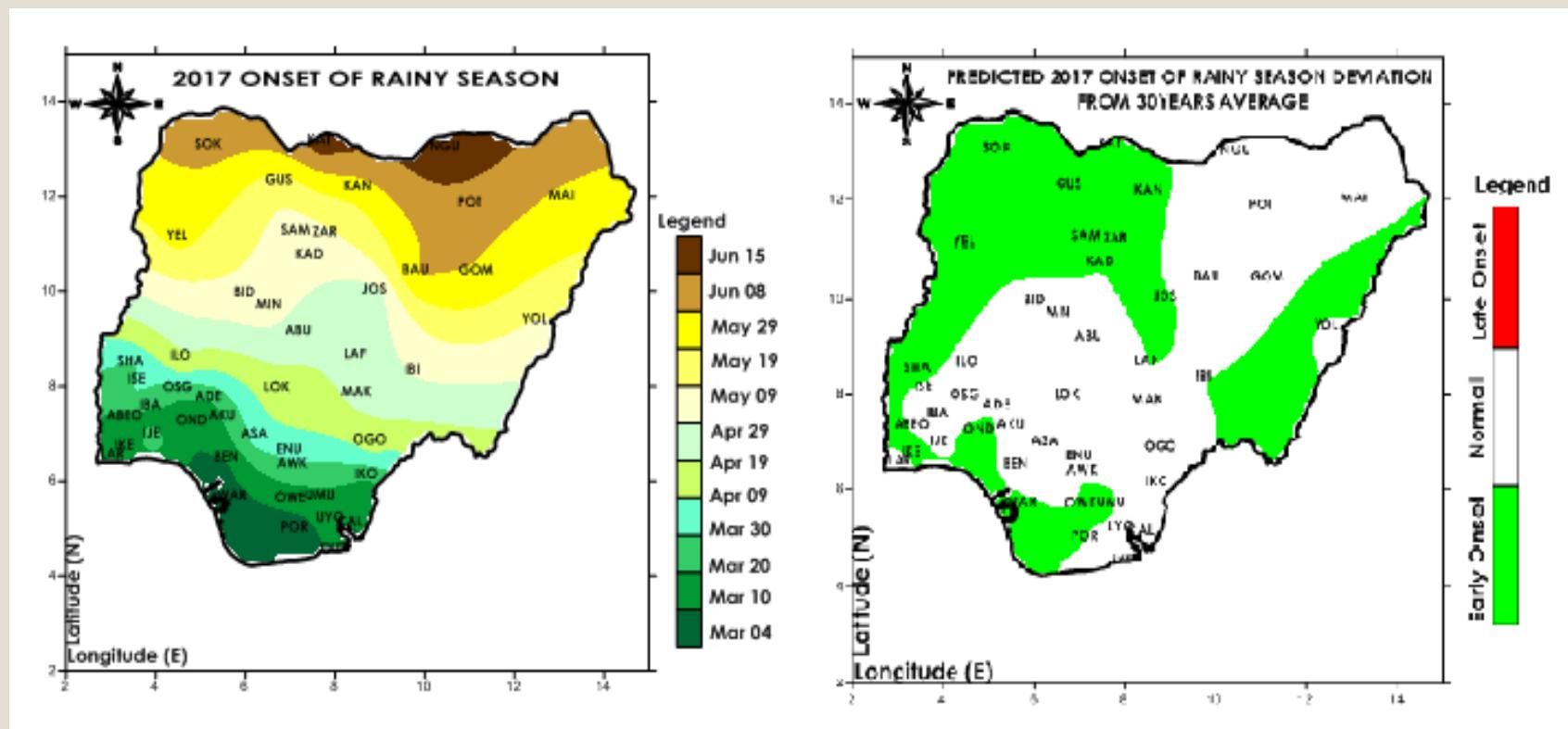
Length of the growing season

Heat Stress forecast

Evaluation of the 2016 predictions

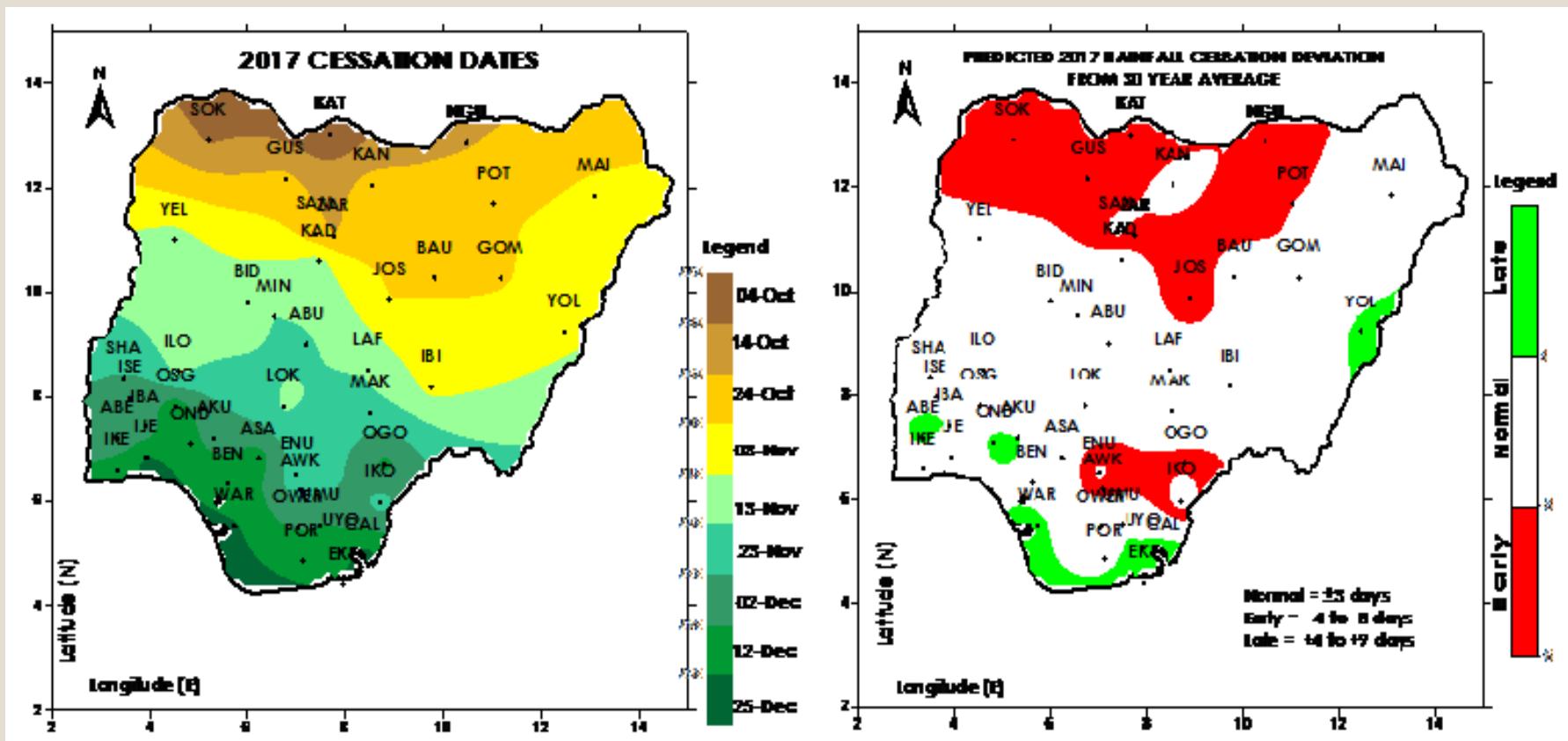
Onset Dates of the growing season

NiMet predicts the earliest onset date to be February 25th over the coastal region of the Niger Delta. Sokoto, Zamfara, Katsina, Kano, Kebbi, Kaduna, Plateau, Nasarawa, Taraba, Oyo, Ogun, Lagos, Ondo, Delta, Bayelsa and Rivers States are predicted to record early onset dates by about 3 to 7 days range from their 30year normals.



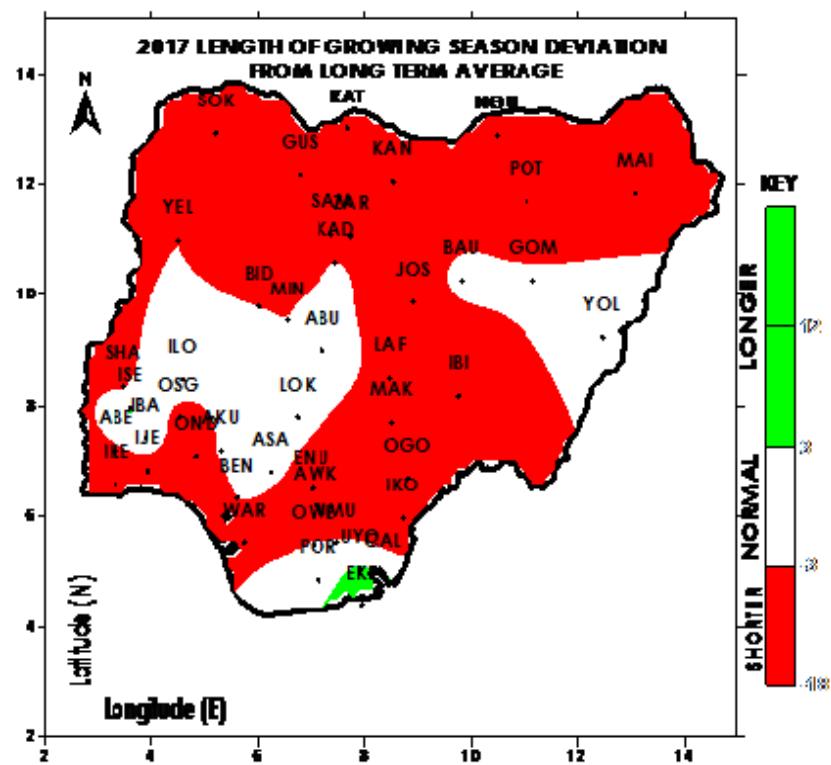
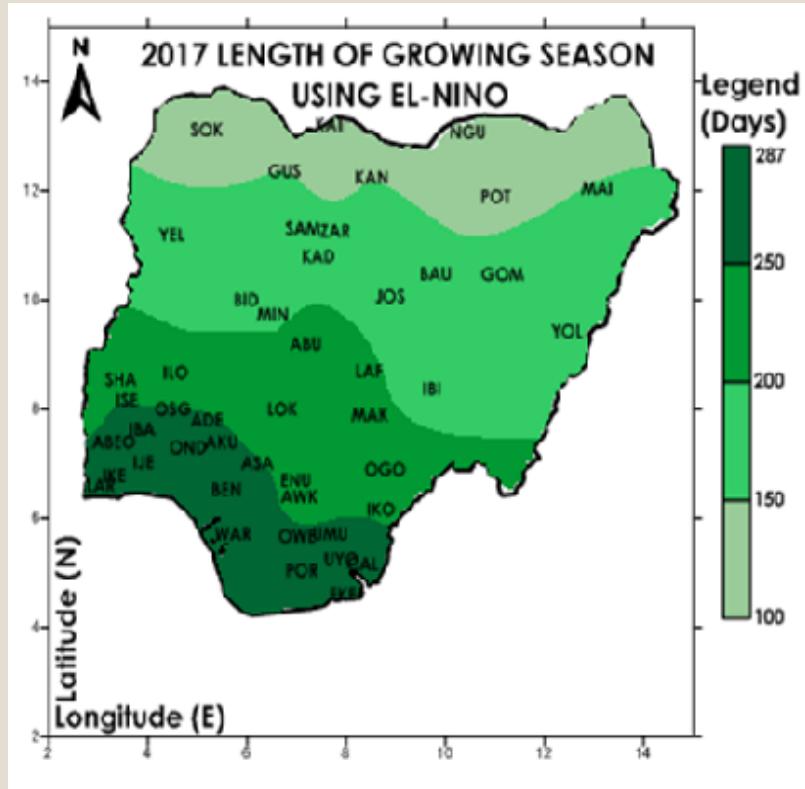
Cessation Dates of Growing Season and Deviations

In 2017 Katsina State is expected to experience the earliest cessation date around **October 4th, 2017**. Early cessation of rainfall is predicted in many parts of the North and inland of the southeast.



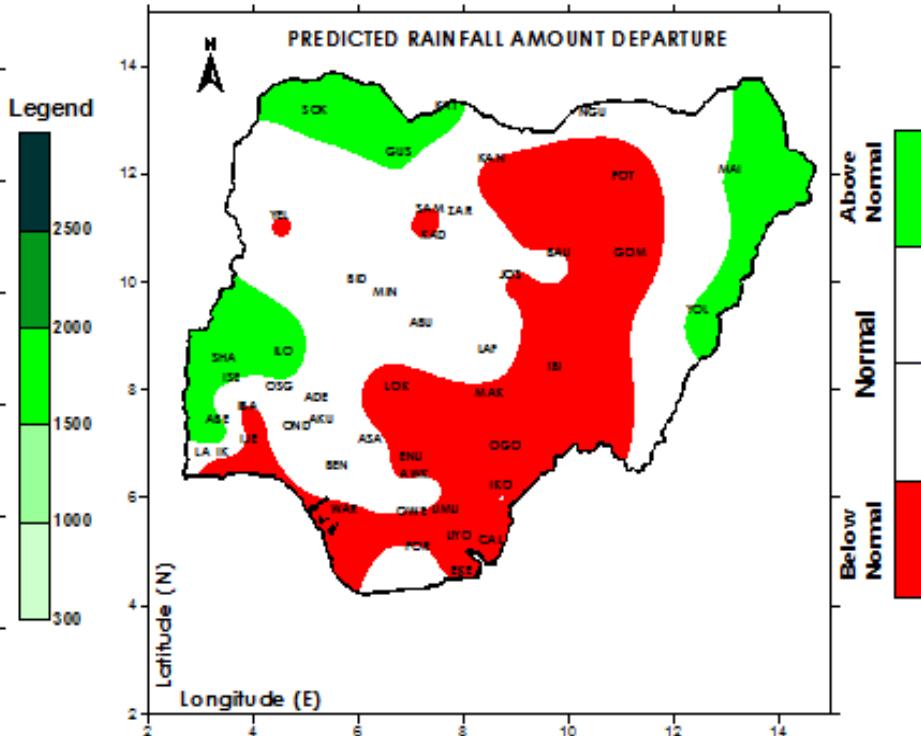
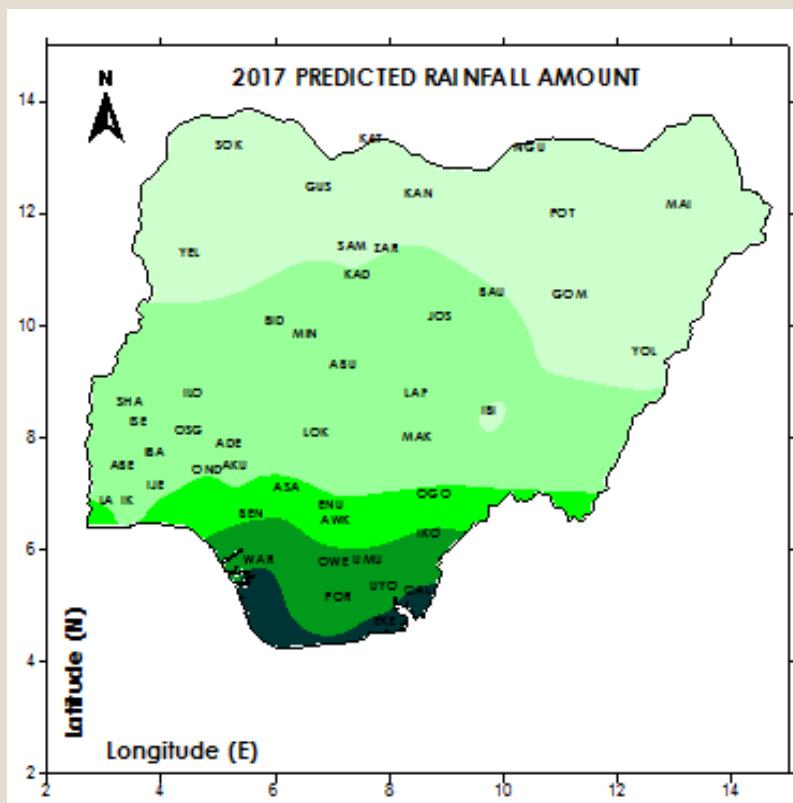
Length of Growing Season and Deviations

A shorter length of the season is predicted for a larger part of the country

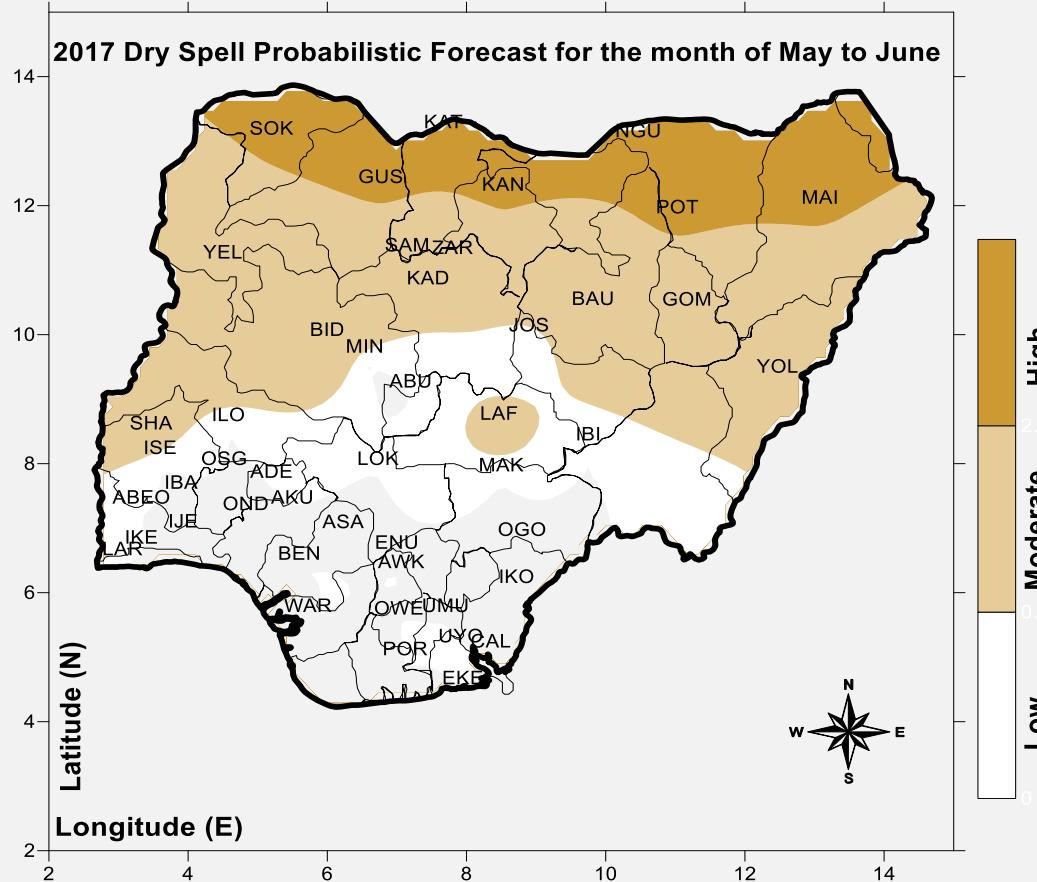


Predicted Annual Rainfall and Deviations

The country is likely to experience a wetter start and a drier end of the season. Rainfall is predicted to be **below normal** over Yobe, Kano, Bauchi, Gombe, Kebbi, Plateau, Taraba, Benue, Kogi, northern Cross River, Enugu, Imo, Abia and some of the coastal areas, while it is predicted to be **above normal** in and around Sokoto, Zamfara, Niger, Kwara, Oyo, Ogun and Adamawa States. The rest of the country will experience “normal” rainfall.



NiMet's 2017 Seasonal Rainfall Prediction (SRP)

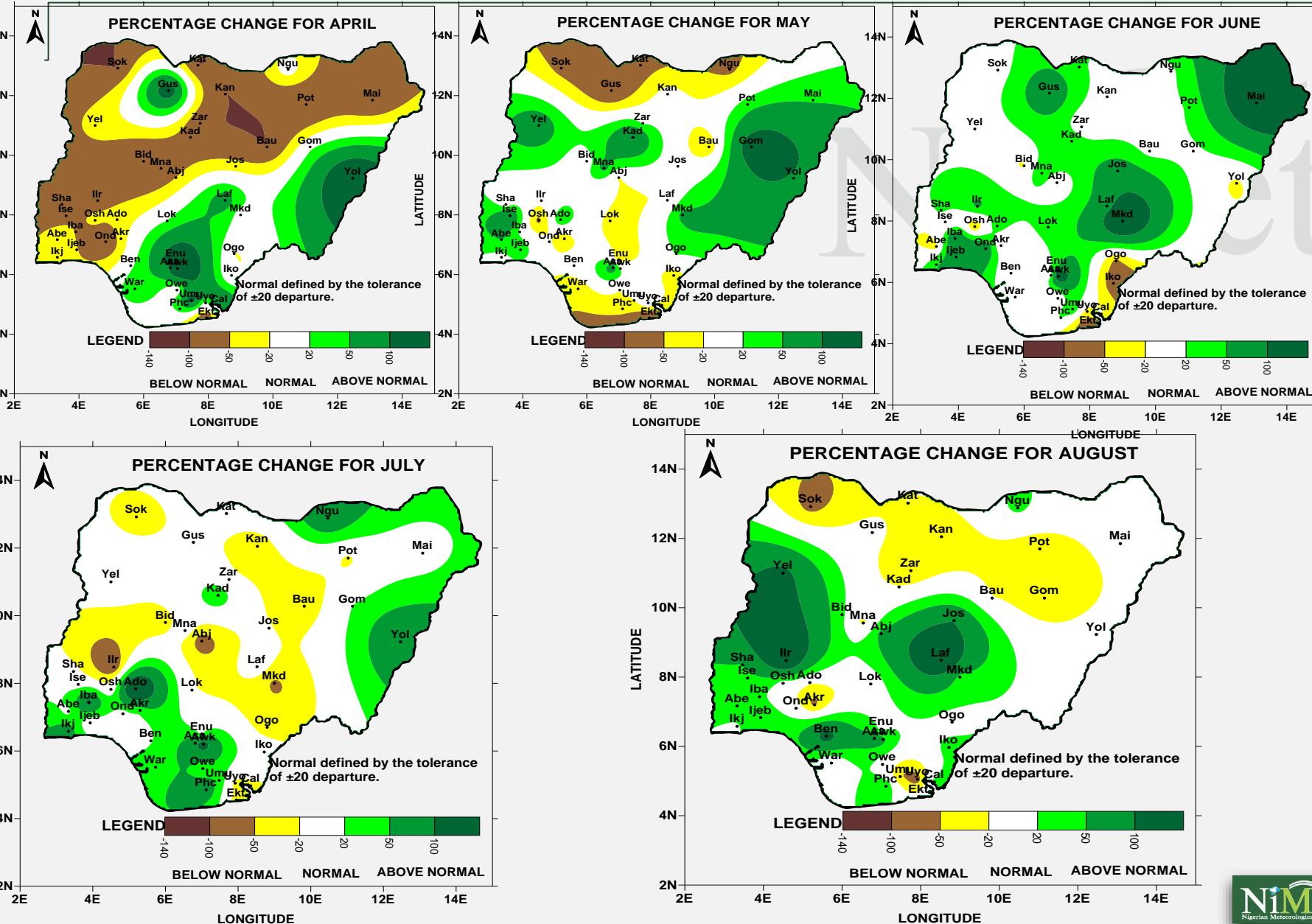


Dry-spells

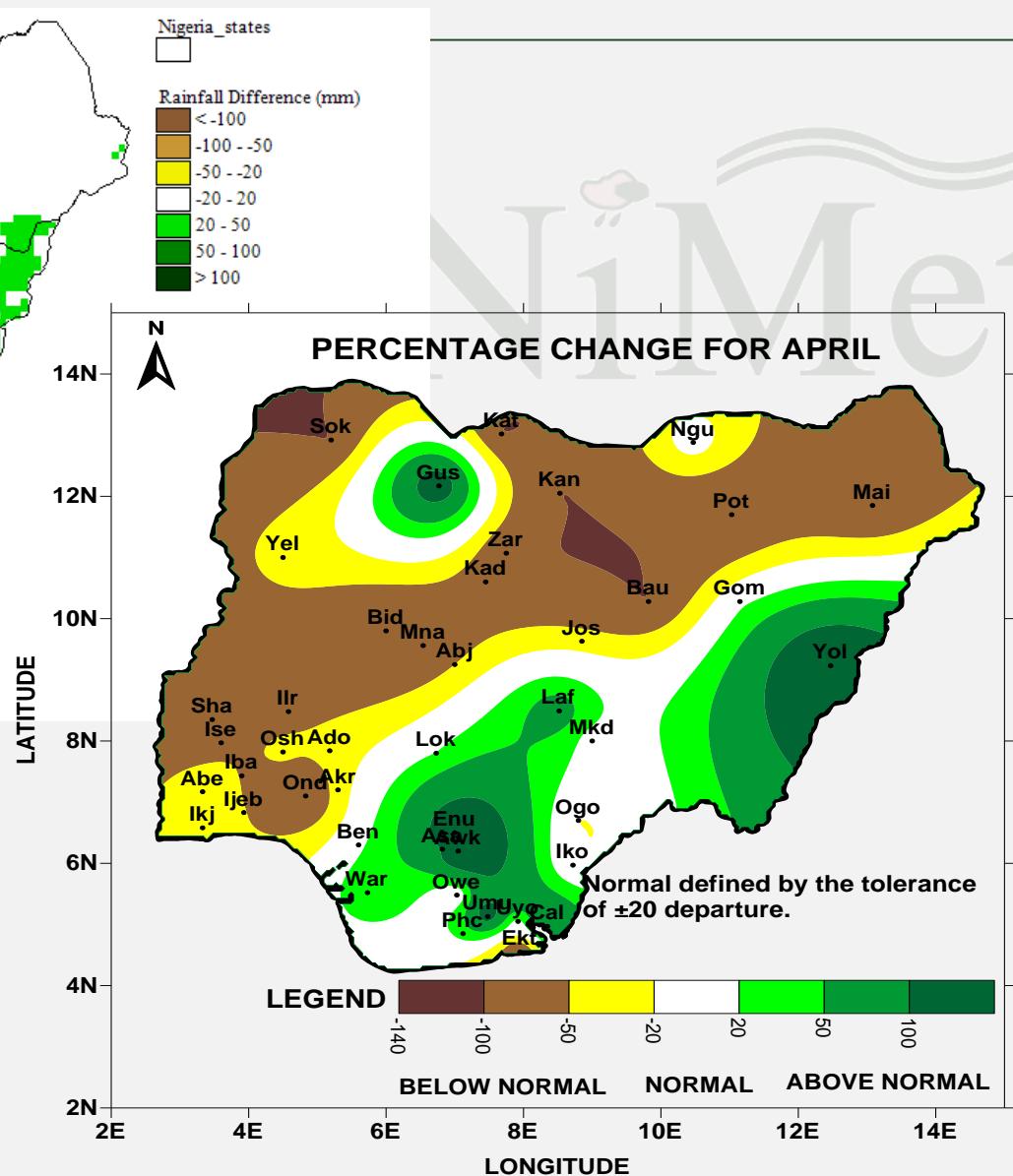
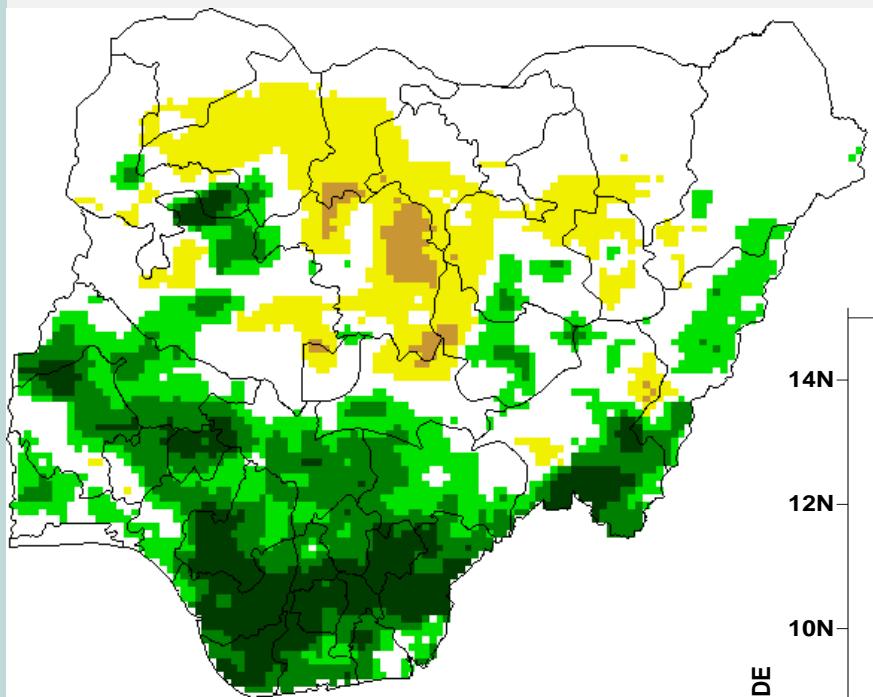
(consecutive 10 days or more without rainfall after the onset and the rains have established) are predicted to occur in the central States in May (8-12 days) and northern States in June/July (14-20 days)

2017 Rainfall Evaluation

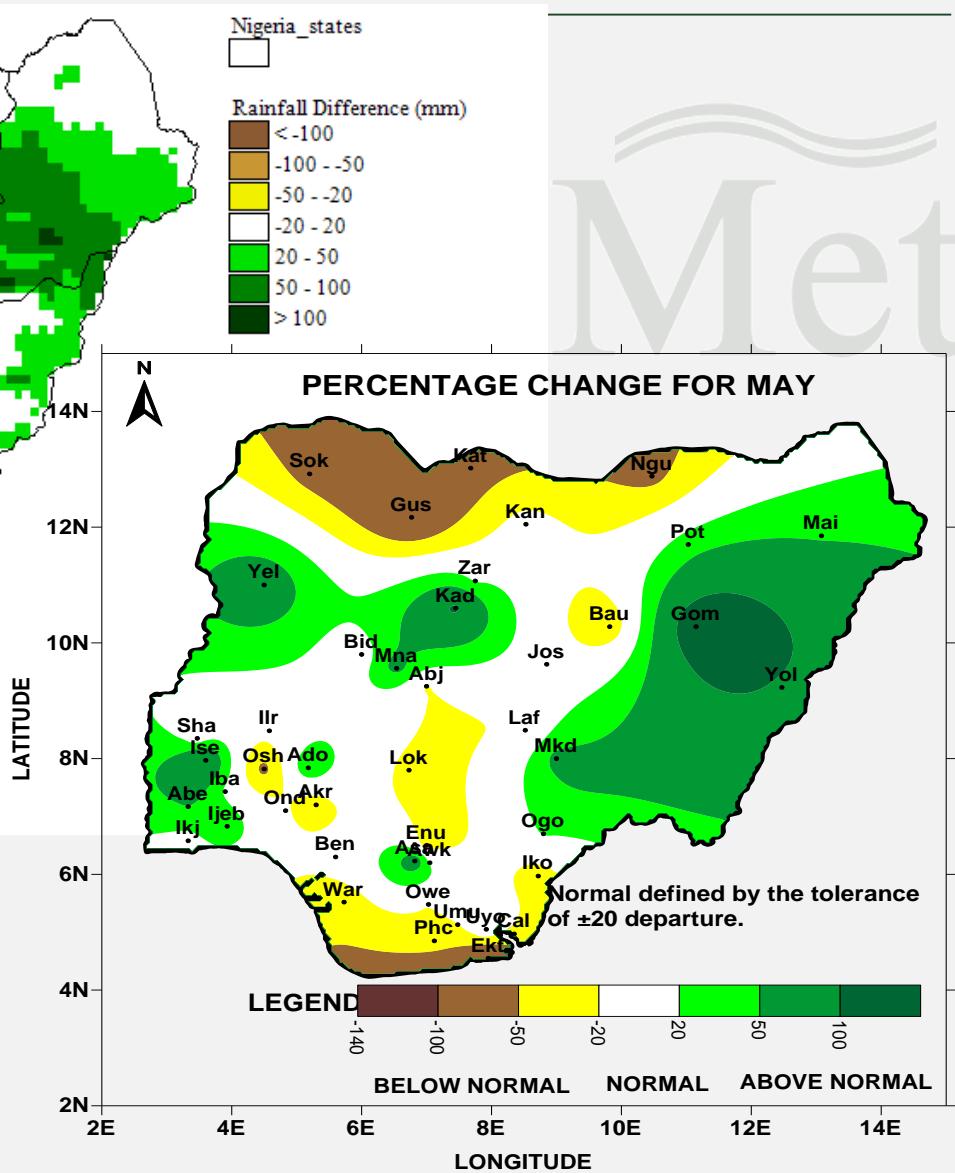
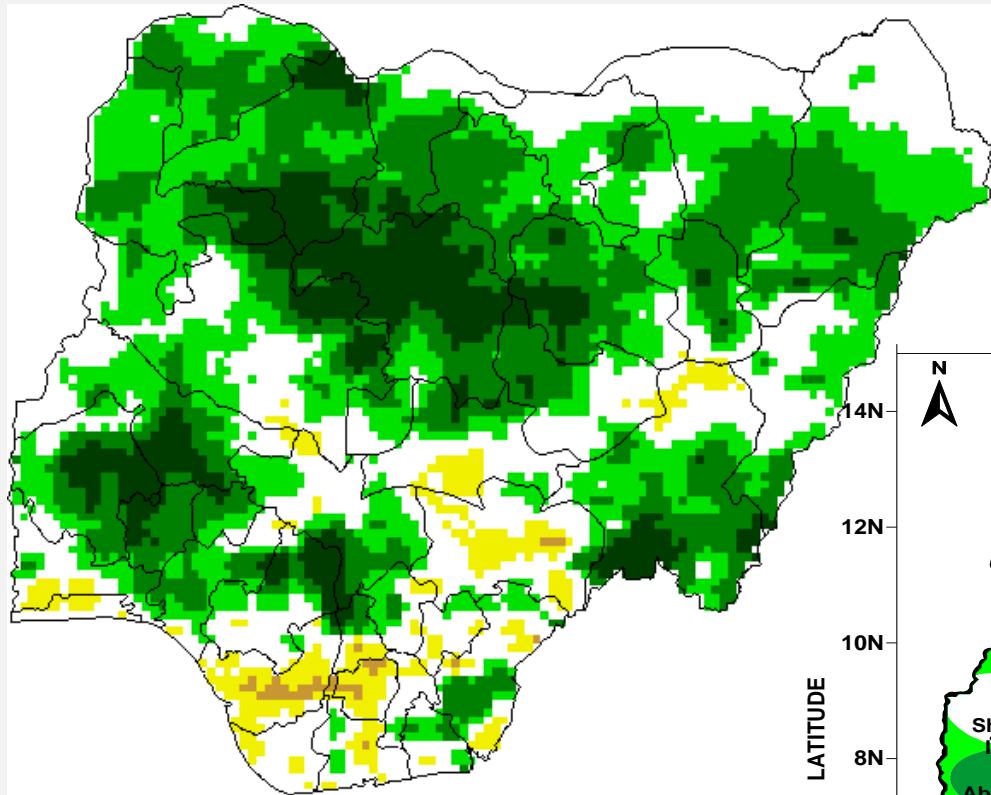
MONITORING AND EVALUATION



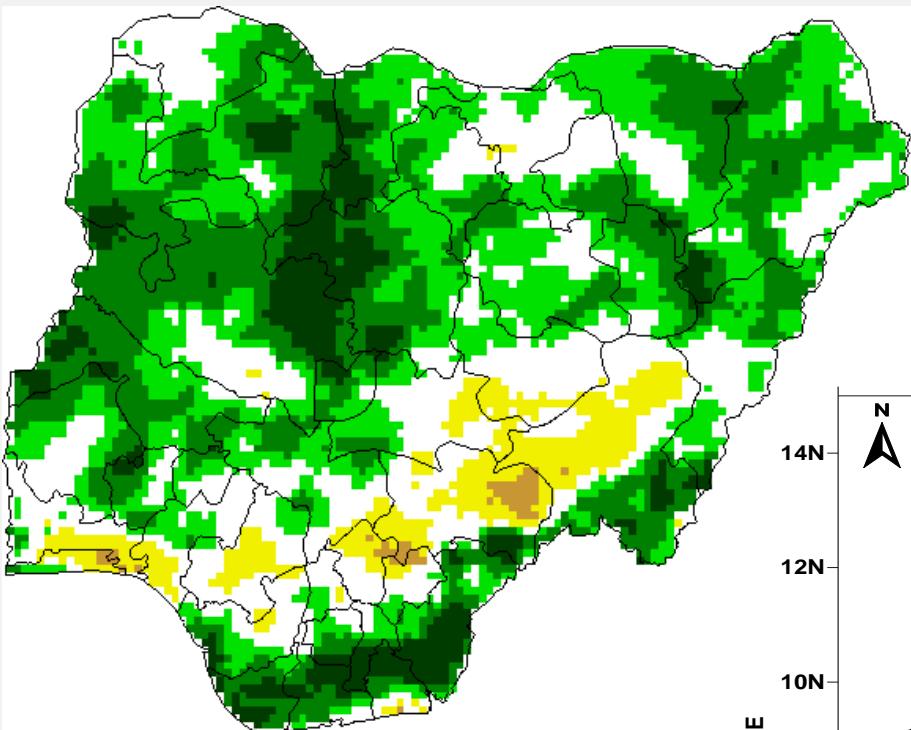
APRIL 2017



MAY 2017

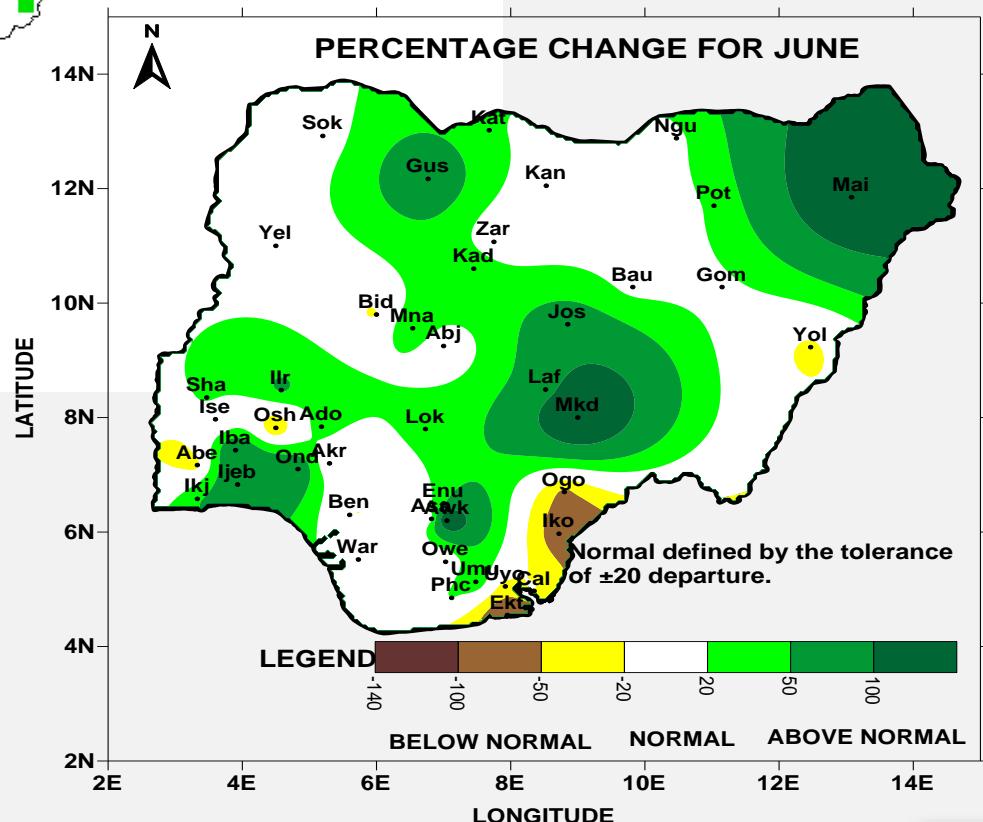


JUNE 2017

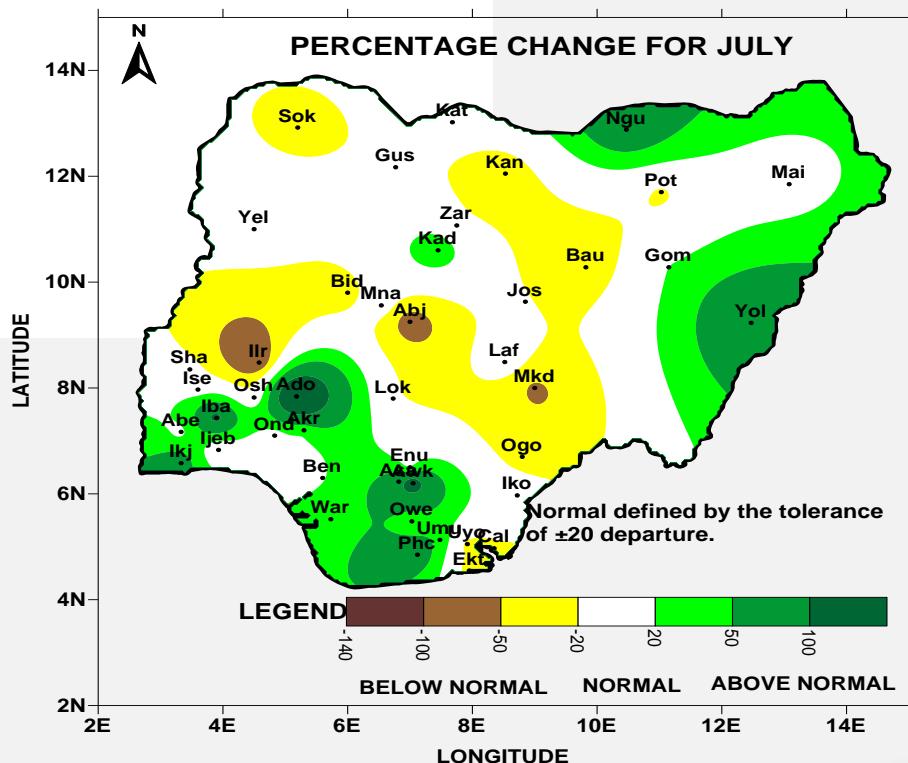
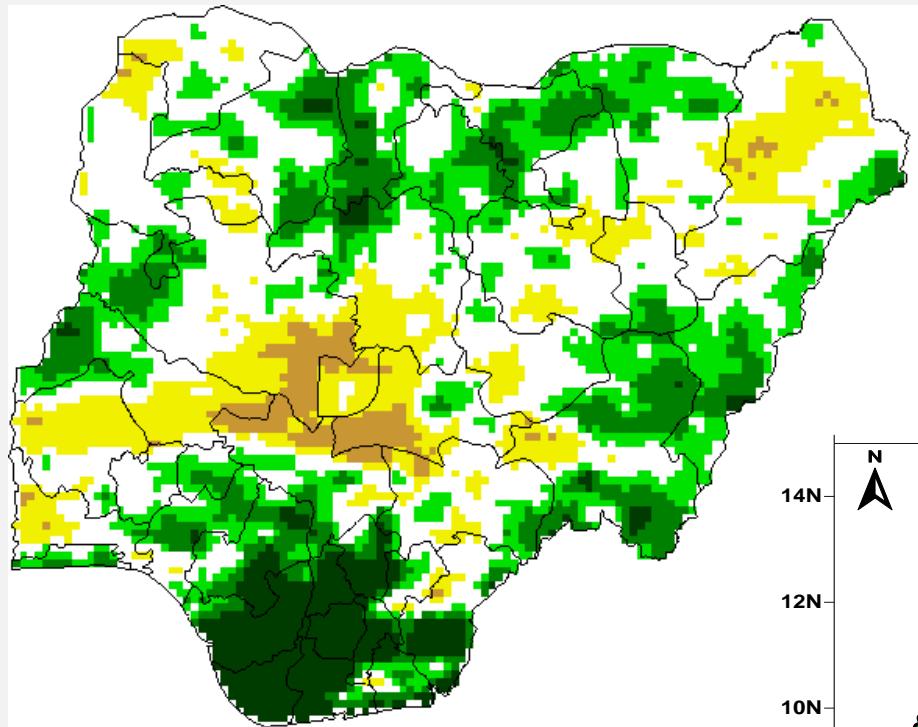


Nigeria_states

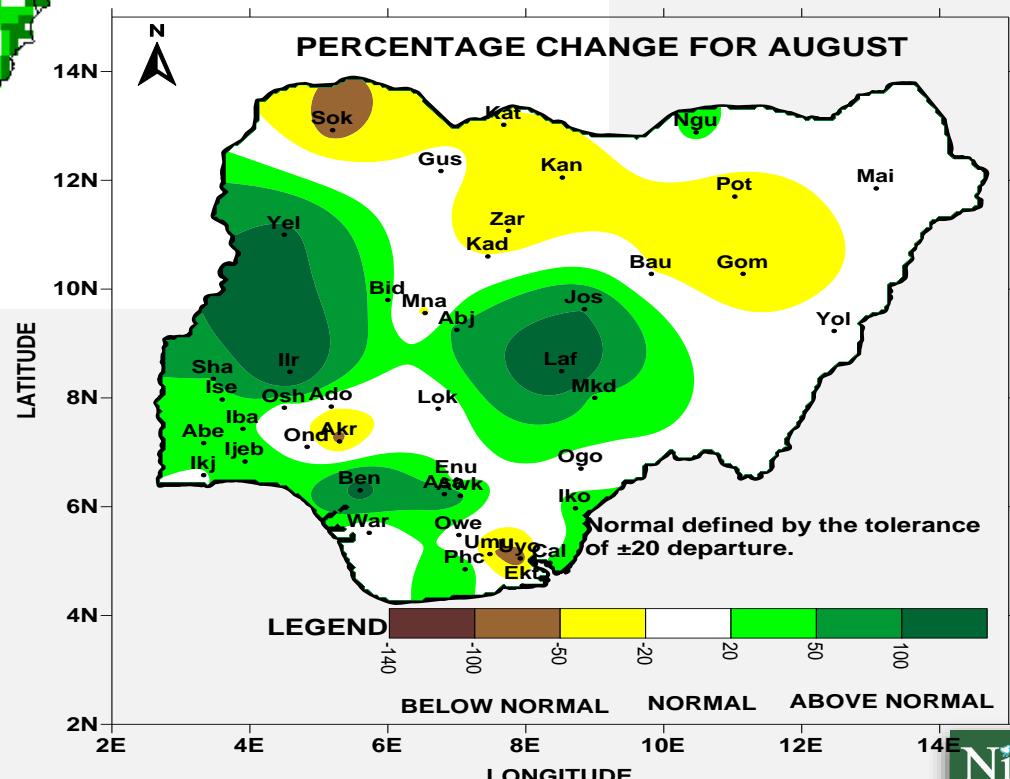
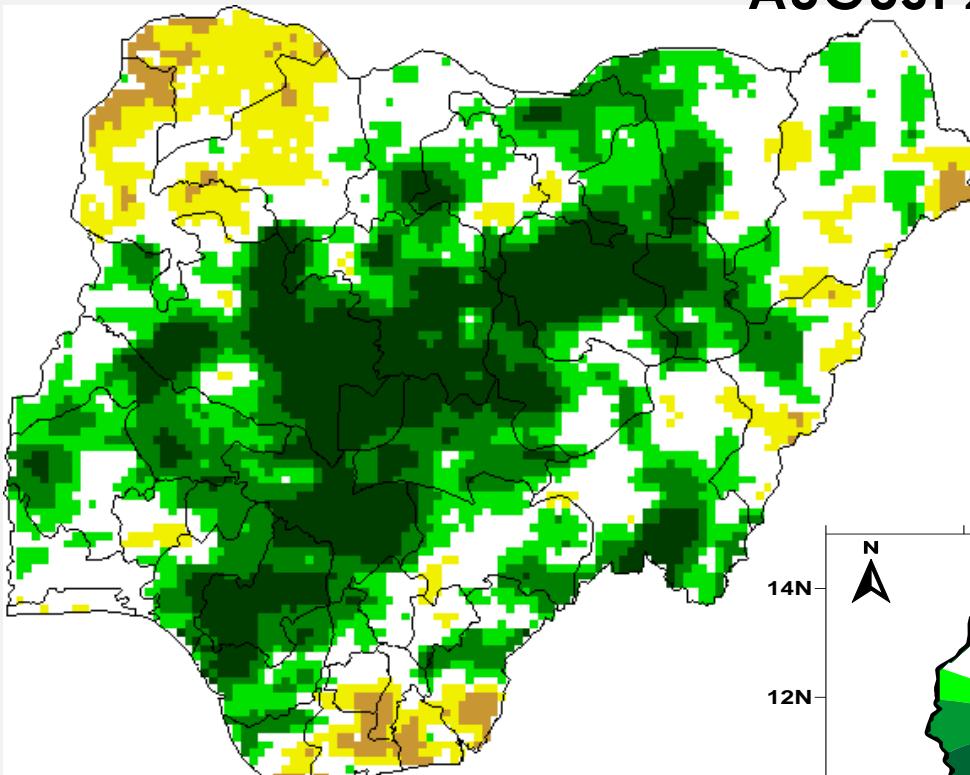
Rainfall Difference (mm)
< -100
-100 -- -50
-50 -- -20
-20 -- 20
20 -- 50
50 -- 100
> 100



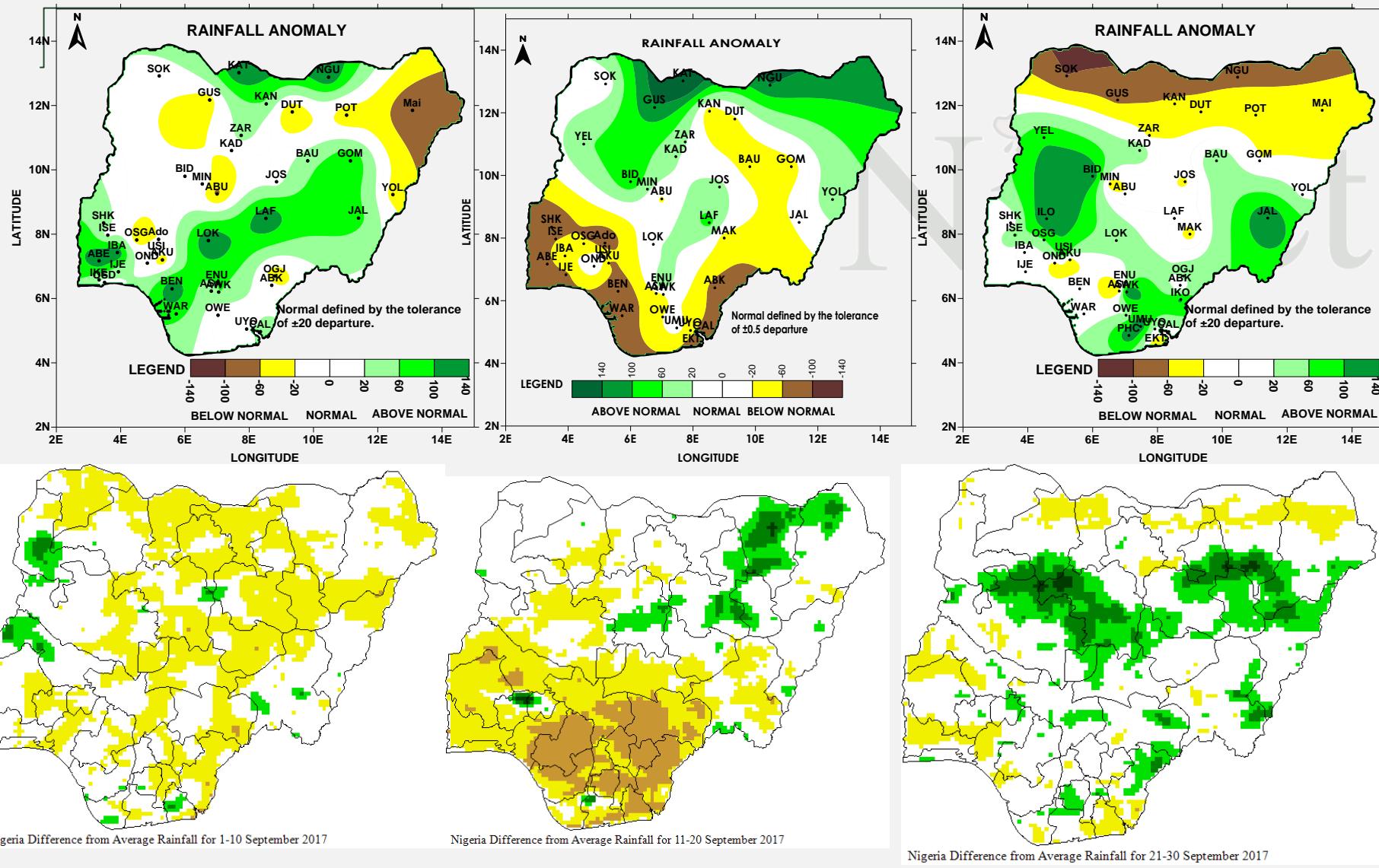
JULY 2017



AUGUST 2017



SEPTEMBER 2017



SOKOTO cumulative RFE

- Mean (2001-Present)
- 2017
- 2016
- Minus 1 Standard Deviation
- Plus 1 Standard Deviation

