

NIGERIAN METEOROLOGICAL AGENCY 33 POPE JOHN PAUL II STREET, MAITAMA DISTRICT, P.M.B. 615, GARKI, ABUJA, NIGERIA

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SUMMARY

The dekad witnessed moderate to heavy rains across the country with concomitant flooding and erosion. Lagos area recorded over 200mm of rainfall which flooded farmlands and streets causing traffic gridlocks in most parts of the metropolis. Some parts of the south, the north central and extreme north had surplus soil moisture conditions while elsewhere recorded deficit. Temperatures warmer than normal continued to be experienced along the north (Sokoto, Gusau, Katsina, Kano, Nguru, Potiskum, Maiduguri and Yola) while Jos and Shaki remained colder than normal. Yelwa, Sokoto, Gusau, Katsina, Kano, Nguru, Bauchi, Potiskum, Gombe, Maiduguri and Yola in the north recorded temperatures above 32 Deg C while other stations had below 32 Deg C. Apart from the harvesting of vegetables, maize and cassava, the dekad witnessed harvest of new yams in some parts of the south.

1.0 RAINFALL TREND

1.1 Rainfall Anomaly

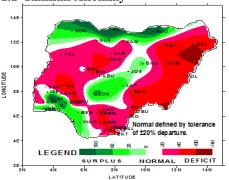


FIG. 1: 3RD DEKAD OF JUNE, 2011 RAINFALL ANOMALIE S(%) OVER THE COUNTRY. ANOMALIE S ARE COMPUTED WITH RESPECT TO 1971-2000 BASE PERIOD DEKADAL MEANS.

The rainfall anomaly during the dekad is shown in Fig I above and indicates that deficit rainfall anomalies were recorded in most parts of the country except parts of the extreme north, some parts of the north central and the southwest (green areas). Other areas remained normal.

1.2 Rainfall Amounts

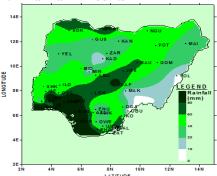


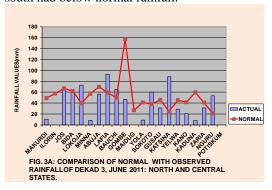
FIG.2: ACTUAL AMOUNT OF RAINFALL FOR DEKAD 3, JUNE 2011.

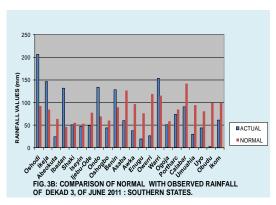
Fig 2 above shows the rainfall received across the country and reveals that all parts of the country recorded over 20mm of rains. However areas such as

Oshodi, Ikeja, Ondo, Ibadan and Benin recorded over 100mm of rainfall. Station at Oshodi received 206.6mm in 9 raindays that resulted to flooding and erosion which disrupted traffic in Lagos metropolis and submerged buildings and farmlands.

1.3 Comparison of Normal with Actual Rainfall for the dekad

The comparison of the actual rainfall amount with normal rainfall values in some selected stations across the south and north is shown in *Figs 3A & B* below. Both *Figs.* show that most stations in the north and south had below normal rainfall.





1.4 Number of Rain Days

Fig 4 shows the distribution of rainfall across the country and reveals that the dekad received good distribution across the country with only few stations in the north having below 2 raindays. Generally rainfall distribution favoured field crops especially crops that required wide rainfall spread.

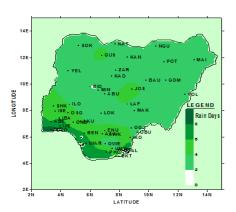


FIG.4: ACTUAL NUMBER OF RAIN DAYS FOR DEKAD 3, JUNE 2011.

2.0 SOIL MOISTURE CONDITION

The decadal distribution of soil moisture across the country is shown in *Fig* 5 and indicates that the south, parts of the extreme north and north central (green areas) had surplus soil moisture condition while the some parts of the northeast flank (red), Kaduna and environs were under deficit. Other areas were normal. Generally, the soil moisture across the country was favourable for optimum crop development and growth.

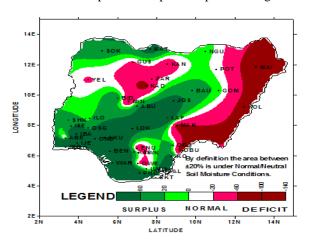


FIG.5: 3RD DEKAD OF JUNE, 2011 SOIL MOISTURE INDICES.

3.0 MAXIMUM TEMPERATURE TREND 3.1 Maximum Temperature Anomaly

The trend of maximum temperature anomaly over the country is shown in *Fig 6* and indicates that warmer than normal temperatures have continued to be experienced along the extreme north (Sokoto, Gusau, Katsina, Kano, Nguru, Potiskum, Maiduguri and Yola)

while areas in and around Jos and Shaki were colder than normal. The white areas were normal with no significant change when compared with the normal temperatures.

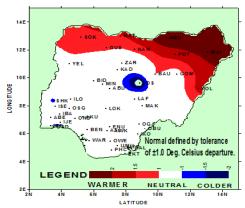


FIG.6: 3RD DEKAD OF JUNE, 2011 MEAN MAXMUM TEMPERATURE A NOMALIES(Deg.C) OVER THE COUNTRY. A NOMALIES A RE COMPUTED WITH RESPECT TO THE 1971-2000 BASE PERIOD DEKA DAL MEANS.

3.2 Maximum Temperature Values

The actual mean maximum temperature distribution is shown in *Fig* 7 below and reveals that the extreme north (Yelwa, Sokoto, Gusau, Katsina, Kano, Nguru, Bauchi, Potiskum, Gombe, Maiduguri and Yola) recorded temperatures above 32 *Deg C* while the rest had below 32 *Deg C*. With increasing rains across the north, temperatures have continued to drop further down as no station had temperatures above 35 *Deg C*.

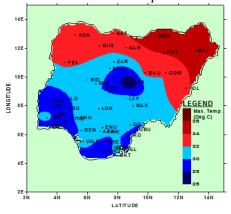


FIG.7: MEAN MAXIMUM TEMPERATURE FOR DEKAD 3. JUNE 2011.

4.0 WEATHER/AGRICULTURAL OUTLOOK FOR DEKAD 1 (1 TO 10), OF JULY 2011

4.1 Weather Outlook

The Inter Tropical Discontinuity (ITD) is expected to move further northward with its position, oscillating between Latitude 18.0 deg. north and 19.0 deg. north. More inflow of moist south westerly and active convective activities are expected.

With the synoptic systems, the northern parts of the country are expected to experience cloudy weather conditions with thunderstorm activities while the central

states are expected to be cloudy with localized thundery activities.

The inland states are expected to be cloudy with associated thundery activities while the coastal areas are expected to experience cloudy weather conditions and widespread rainfall activities.

Maximum temperatures for north and central states are expected to range from $32^{0}C$ to $34^{0}C$ while the minimum temperatures will be from $23^{0}C$ and $25^{0}C$.

Maximum temperatures for inland and coastal areas of the country are expected to range between $29^{\circ}C$ and $31^{\circ}C$ while minimum temperatures are expected to range from 21° to $24^{\circ}C$.

4.2 Agricultural Activity/Outlook

In most parts of the north planting of staple food crops continued while clearing of farmlands and planting were still in progress in the extreme north. In the south and parts of the north central, harvest of maize, vegetables and cassava continued while some farmers in the south commenced harvest of new yam.

Farmers in the extreme north are advised to prepare their farms for planting of new crops as soil moisture and rainfall are quite adequate to support crop growth and development.

TABLE OF AGROMETEOROLOGICAL DATA FOR THE DEKAD

STATIONS	TOTAL RAINFAL (mm)	TOTAL RAIN DAYS	EVAPOTRANSPIR ATION (mm)	MEAN MAXIMUM TEMP (^O C)	MEAN MINIMUM TEMP (^O C)	DEGREE DAYS (MAIZE)	MEALN RADIATION (MJ/m²/day)
ABEOKUTA	24.2	6	37.3	30.7	23.1	189	15.7
ABUJA	56.6	4	36.7	29.9	22.3	180. 5	15.6
AKURE	-	-	-	-	-	195.	-
ASABA	59.6	4	38.6	31.5	23.6	3	16
AWKA	37.4	5	35.9	30.6	23.7	191. 5	15
BAUCHI	64.9	3	43.5	32.7	22.5	196. 1	18
BENIN	128	6	34.6	30.1	23.6	188.	14.5
BIDA	59.1	2	37.9	31.1	23.2	191.	15.8
CALABAR	90.1	9	32.5	29.0	23.2	180.	13.9
EKET	-	-	-	-	-	-	-
ENUGU	19.2	5	36.4	30.0	22.7	183. 6	15.4
GOMBE	46.8	3	41.2	32.0	22.9	194. 6	17.1
GUSAU	31.1	5	42.9	33.0	23.1	200. 4	17.7
IBADAN	131.8	6	35.3	29.7	22.8	182. 4	15
IJEBU ODE	48.2	7	32.9	29.0	22.9	179. 6	14
IKEJA	146.2	9	29.8	29.0	23.6	182. 8	12.6
IKOM	61.1	5	34.9	29.6	22.8	182	14.8
ILORIN	-	-	-	-	-	-	-
ISEYIN	46.9	4	36.1	29.2	21.6	174	15.5
JOS	66.4	5	36.4	25.9	17.0	134. 4	16.9
KADUNA	7.9	2	39.9	30.4	21.2	178. 3	17.1

KANO	20.2	2	43.6	33.1	22.9	200	18
KANO	20.2		43.0	33.1	22.9	204.	18
KATSINA	88.3	3	43.7	33.6	23.3	6	17.9
						194.	
LAFIA	93	4	36	31.0	23.9	2	14.9
		_				200.	
LOKOJA	73	2	37.6	31.8	24.4	9	15.5
MAIDUGURI	Tr	0	44.5	35.0	24.9	219. 6	17.7
MAIDOGORI	- 11	0	77.3	33.0	24.7	188.	17.7
MAKURDI	10.2	2	40.2	31.3	22.4	2	16.9
						182.	
MINNA	8.3	2	40.5	30.8	21.6	4	17.2
NCHIDII	52.1	2	46.0	25.4	24.2	217.	10.7
NGURU	53.1	3	46.8	35.4	24.2	8 190.	18.7
OGOJA	50.4	4	38.1	31.0	23.2	6	15.9
						182.	
ONDO	133.5	5	35.7	29.8	22.7	8	15.1
						183.	
OSHODI	206.6	9	26.2	28.5	24.3	8	11.1
OSOGBO	43.6	5	35.8	29.4	22.1	177. 5	15.4
Озодьо	43.0	3	33.0	29.4	22.1	181.	15.4
OWERRI	26.2	3	33	29.3	23.1	8	14
						184.	
PHC	73.4	7	31.2	29.2	23.7	1	13.2
POTISKUM	-	-	-	-	-	-	-
SHAKI	50.7	_	36	20.7	21.0	168.	15.7
SHAKI	50.7	5	30	28.7	21.0	208.	15.7
SOKOTO	60.4	2	40.4	33.3	24.5	7	16.4
							13.9
UMUAHIA	29.8	4	32.6	29.2	23.2	182	
*****					•	197.	
UYO	43.4	2	37.5	31.4	24.0	191.	15.5
WARRI	153	7	35.4	30.5	23.8	191.	14.8
Wilde	155		33.4	30.3	23.0	202.	14.0
YELWA	28.9	3	39.1	32.4	24.2	9	16
							17.3
YOLA	8.6	3	42.9	33.9	24.5	212	
ZARIA	31.3	2	41	30.8	21.1	179.	17.5
LAKIA	31.3		41	30.8	21.1	4 178.	17.5
OBUDU	2.2	2	35.7	29.4	22.3	4	15.2

Dear All,

Comments and suggestions on how to improve this publication are welcome. Agrometeorologists, Agriculturists, Extension Workers, Research Officers, Users and the General Public should kindly send feedback to:

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