## LESOTHO METEOROLOGICAL SERVICES

(LEKALA LA TSA BOLEPI)



## **Ten-Day Agrometeorological Bulletin**

1st -10th November 2006



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...dedicated to the agricultural community
... aimed at harmonizing agricultural activities with weather and climate

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# Highlights

- Above rainfall situation during this period.
- □ Planting is still in progress.
- Scattered rains anticipated.

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#### **WEATHER SUMMARY**

At the beginning of the dekad that is on the 01<sup>st</sup> the interior surface trough deepened. This deepening system was associated with an upper level trough which was at the same time deep over the interior. This resulted in widespread and heavy rain with thundershowers from the evening of the 01<sup>st</sup> continuing up to the 02<sup>nd</sup>. Since then the interior trough filled with little or no moisture associated with it and no significant rainfalls occurred except for only light drizzle at times.

#### **RAINFALL SITUATION**

Rainfall during this first dekad of November 2006 was above normal dekadal rainfall throughout the country. The rain days were within two (2) days. The rainfall distribution was spatially well distributed.

The rainfall amount of 139.8mm was registered at Moshoeshoe I as the highest dekadal rainfall while 34.8mm was recorded at Mafeteng as the lowest dekadal rainfall. This improved rainfall is believed to have promoted agricultural activities throughout the country.

## **Cumulative percentage rainfall departure** from Normal



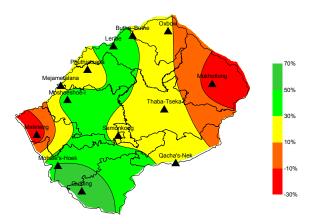


Fig.1: Cumulative rainfall departure from normal since 1st Sept to 1st dekad November 06.

Cumulative rainfall since 1<sup>st</sup> dekad of September 2006 has improved because it's only Mafeteng and Mokhotlong which shows rainfall shortage

occurrence where negative % departure of -26% and -20% were registered respectively. This is clearly shown on the map above (red shaded areas). Nevertheless, the rest of the country had improved cumulative rainfall as % departure ranged between 15% at Phuthiatsana and 61% at Quthing.

#### **TEMPERATURE**

Dekadal mean temperatures were slightly below dekadal normal temperatures throughout the country. This is precisely shown in table 1 where only negative temperature deviations registered throughout the country. These negative temperature deviations from normal ranged between -0.9 and -2.5 (see table 1 under temperature). The highest dekadal temperature of 29.5°C was registered at Quthing on the 10<sup>th</sup> and the lowest temperature of -0.5°C was registered at Semonkong on the 6<sup>th</sup>. These low temperatures slowed crop development.

#### **CROP STAGE AND CONDITION**

Agricultural activities are currently centered at planting summer crops especially maize and sorghum throughout the country. Furthermore, some of these crops are at germinating stage.

Apart from that, planting has started earlier this year as compared to last year. This is because rainfall occurred in time, that is improved rainfall were experienced since the beginning of the planting season.

#### **DEKADAL OUTLOOK**

11th - 20th November 2006

This period is expected to be mostly partly cloudy to cloudy and warm becoming hot at times. Scattered to widespread rain with thundershowers is anticipated especially between the 16<sup>th</sup> and the 19<sup>th</sup>

#### Table 1

Rainfall and Temperature Summaries												
		Rair		Rainfa	infall (mm)		( 1 ( D )	Temperature (°C)				
		01 - 10 Nov 2006			Total From Sept06 to 1st Dek Nov06			01 - 10 November 2006				
STATION	ALT.	Actual	Normal	Rain			%Dept. from	Minimum	Maximum	Dekadal	Dekadal	
NAME	(M)	R/Fall	R/Fall	Days	Actual	Normal	Normal	Lowest(D ay)	Highest (Day)	Mean	Normal	Deviation
Butha-Buthe	1770	78.5	38.5	2	191.6	148.3	29	5.0 (7)	26.2 (10)	15.6	17.5	-1.9
Leribe	1740	83.2	28.9	2	188.0	126.0	49	4.5 (6)	27.0 (10)	15.7	17.8	-2.1
Mafeteng	1610	34.8	23.2	2	81.4	110.6	-26	5.0 (6, 7)	-		17.5	N/A
Maseru Airport	1530	70.5	26.4	2	139.1	120.4	16	4.8 (6)	28.3 (10)	16.8	18.8	-2.0
Mohale's hoek	1600	66.0	24.5	2	182.0	119.5	52	5.6 (6)	27.6 (9)	15.8	18.2	-2.4
Mokhotlong	2200		27.5		95.0	118.8	-20	3.0 (4)	, ,	13.6	14.9	-1.3
Moshoeshoe I	1628	139.8	29.2	2	195.6	135.0	45	4.0 (6)	27.4 (9)	15.8	18.3	-2.5
Ox-Bow	2600		55.4		0.0	239.0			-		10.0	N/A
Phuthiatsana	1750	81.9	33.4	2	163.7	141.8	15	4.9 (6)	27.9 (10)	17.6	18.5	-0.9
Qacha's Nek	1970		29.9			135.8					15.8	N/A
Quthing	1740	73.1	32.6	3	231.2	143.4	61	5.6 (4)	29.5 (10)	16.0	17.8	-1.8
Semonkong	2458	63.8	24.6	3	165.1	132.5	25	-0.5 (6)	21.8 (10)	10.9	13.0	-2.1
ThabaTseka	2160	55.6	21.5	2	154.5	121.8	27	1.5 (6)	23.1 (9, 10)	13.0	14.5	-1.6

Fig.3

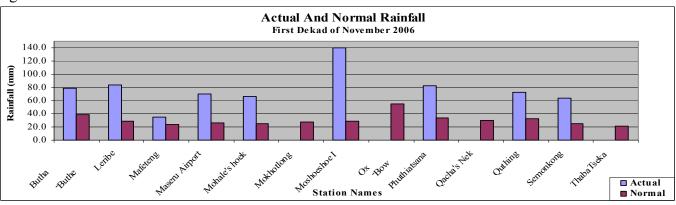
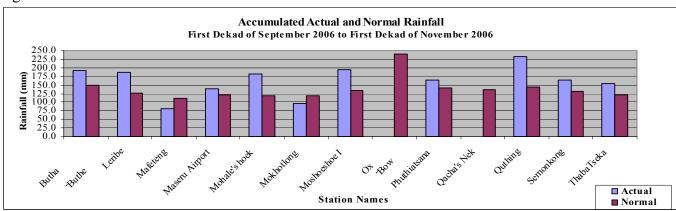


Fig.4



### Glossary

Dekad: Ten day period

Normal: Average figure over a specific time period.

% Rainfall Departure from Normal: (Actual Rainfall – Normal Rainfall)/ Normal Rainfall x 100

NDVI: Normalized Difference Vegetation Index -

This Bulletin is issued during the Summer Cropping Season (October – April).

## And it is

### Produced by the

Lesotho Meteorological Services as a contribution to the National Early Warning Unit for Food Security.

The Unit is coordinated by the Disaster Management Authority in the Prime Minister's Office.

Comments and Contributions would be highly appreciated.