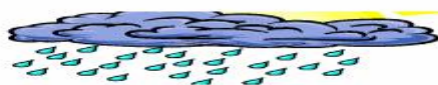




TANZANIA METEOROLOGICAL AGENCY



DEKADAL WEATHER REVIEW

No.6. 2010/11 Cropping Season

October 21-31, 2010

HIGHLIGHTS

Soil moisture improved slightly over areas surrounding the Lake Victoria, however early planted crops usually beans and maize over those areas particularly Kagera region did not grow well due to inadequate supply of soil moisture.

SYNOPTIC SITUATION

During the 3rd dekad of October 2010, the Azores High and Siberian High together with the Arabian ridge in the northern hemisphere intensified slightly. In the southern hemisphere the St. Helena high, Mascarene high pressure systems and the associated East African ridge remained relatively weak that resulted into less push of moisture from Indian Ocean to the country, thus less rainfall activities were observed over most parts of the country. The zonal component of the rain-band system the Inter-Tropical Convergence Zone (ITCZ) remained relatively diffused while the meridional component continued to influence rainfall over the Lake Victoria Basin and parts of western regions. The low level wind flow over the country was observed to vary between northeasterly to southeasterly along the coast and mainly southerly to southeasterly over the mainland. However, a northwesterly wind was observed over the Lake Zone and Kigoma region resulting in a weak low level convergence which enhanced rainfall and thunderstorms activities over these areas.

RAINFALL SUMMARY

During the third dekad of October 2010 dry conditions were experienced across much of the country. False start of short rains was

predominantly reported over bimodal areas of Lake Victoria Basin where dry spells exceeding 10 days were observed. However, a few stations over bimodal rainfall areas which recorded rainfall exceeding 20 mm in a dekad were over northern coast and islands of Zanzibar and Pemba (Zanzibar 62.5 mm, Pemba 61.1 mm, and Tanga 39.8 mm), and Lake Victoria basin (Mwanza 47.6 mm, Ukiriguru 45.0 mm, Kibondo 28.7 mm, and Musoma 28.1 mm), and western (Kigoma 52 mm). A few stations from sample stations recorded rainfall below 10 mm, except Mahenge in southern Morogoro which recorded 23.2 mm as shown in Figure 1.

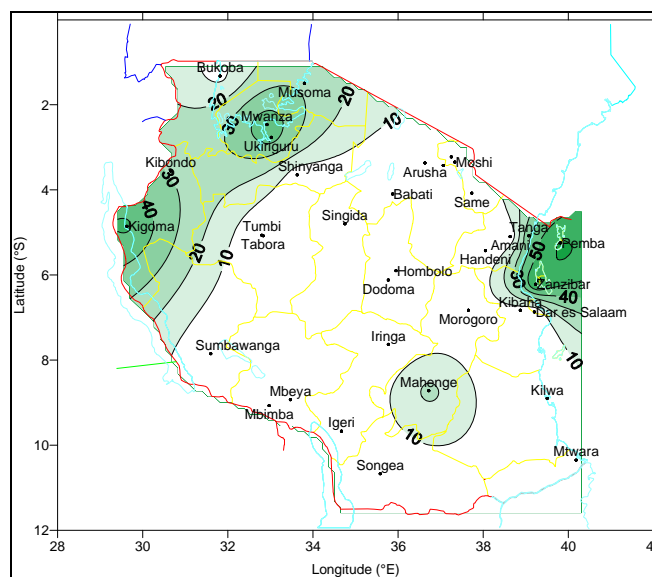


Figure 1: October 21-31, 2010, Rainfall distribution

IMPACT ASSESSMENT

Agrometeorological and Crop Summary

Soil moisture improved slightly over areas surrounding the Lake Victoria, however early planted crops usually beans and maize over those areas particularly Kagera region did not grow well due to inadequate supply of soil moisture. Dry conditions that persisted in the remaining areas impeded the usual activities during this time thus land preparation continued as the major activity. Over unimodal areas land preparations is expected to start in November 2010.

The dry conditions on the other hand has adversely affected availability of water and pastures for livestock and wildlife largely over northeastern highlands (Arusha, Manyara, and Kilimanjaro regions), central (Dodoma and Singida regions) and parts of southern coast regions of the country.

Hydro-meteorological Summary

Water levels in lakes and dams and river flows have declined due to the prevailing dry season, thus water for human and industrial usage, and hydro-power generation should be used sparingly.

Environmental Summary

Temperatures over most areas in the country were generally warm leading to uncomfortable conditions. The trend is towards warming during coming dekad.

EXPECTED SYNOPTIC SYSTEMS DURING NOVEMBER 1-10, 2010

In the southern hemisphere, the St Helena high and Mascarene high pressure systems with the associated East African ridge are expected to

remain relaxed and slightly retreating southwards as a result of eastwards propagation of frontal systems over the southern tip of Africa. In the northern hemisphere, the Azores High and Siberian High are expected to slightly intensify pushing the zonal arm of the ITCZ southwards in the Eastern Africa resulting into slightly increased isolated rainfall activities over northern coastal areas and parts of north-eastern highlands. Weak low level easterly flow is expected to persist over the coast of Tanzania through the hinterland. Similarly, weak westerly flow is also expected over the western part of the country particularly along Lake Victoria basin and Kigoma areas. Therefore, there will be less injection of moisture into most areas of the country.

EXPECTED WEATHER OUTLOOK DURING NOVEMBER 1-10, 2010

Lake Victoria Basin (Kagera, Mara, Shinyanga and Mwanza regions) and Kigoma region: Scattered rain showers and thunderstorms are likely. Northern coast and hinterland (Dar es Salaam, Morogoro, Tanga and Coastal regions, Unguja and Pemba Islands): are likely to experience scattered rain showers.

Southern Coast (Mtwara and Lindi regions) is expected to feature occasional rainfall activities. Northeastern highlands (Arusha, Kilimanjaro and Manyara regions) are expected to experience light rain showers over few areas. Southwestern highlands (Rukwa, Mbeya and Iringa regions) Minimum chances of rainfall are expected over few areas. Southern region (Ruvuma region) and part of Mahenge are expected to experience mainly dry conditions, with chances of light rain showers mainly over Mahenge areas. Central (Dodoma, Singida and Tabora regions) mainly dry conditions are expected.