### **SUMMARY**

During the first dekad of June 2007, normal to above normal rainfall has been observed over most parts of Tigray, Benshangul-Gumz, Gambala, and SNNPR much of Oromia and Northern Somali. Eastern and central Amhara and the rest parts south and central and southern Somali and Afar have been exhibited below normal rainfall. The Intensification of rainfall distribution was very strong over some areas of Benshangul-Gumuz, western Oromia and SNNPR compare to the rest parts of the country. As a result, most part of western parts of the country exhibited heavy rainfall within the range of (30-82.6) mm in one rainy day. To mention some station observed above 40 mm of rainfall Chagni, Shre, Assosa, and Aira recorded 82.6, 56.0. 50.0 And 45.0 mm in one rainy days respectively. This situation has a positive contribution for the ongoing season's Agricultural activities like land preparation and sowing activities and the crops, which were at early vegetative stage. Regarding to adverse condition, Bedele, reported Crop (sorghum) damage Pawe and Shaura reported Perennial crops (Tree) damage and Aykel reported damage on crops (maize) and vegetable (potato) lands due to heavy fall. Besides, the observed extreme maximum temperature over some areas of Afar, Dubti, Semera and Assayta could have a negative Impact on livestock. With regard to extreme maximum temperature Semera, Assayta, Dubti, Elidar, Gambela, Methera, Metema, ShewaRobit, DireDawa, Cheffa, Mytesemrie, Mankush, Meisso, and Gode exhibited extreme maximum temperature as high as 47.0, 44.6, 45.0, 44.5, 38.5, 38.5, 38.3, 38.2, 37.4, 36.0, 35.5, 35.3, 35.2 and 35.0 °C respectively. Thus this situation would have a negative impact for normal growth and development of plants.

During the second dekad of June 2007, with the exception of Afar, some areas of northwestern and southeastern Amhara, eastern Oromia, central and southeastern Somali, and some areas of Benshangul-Gumuz, most parts of the country exhibited normal to above normal rainfall condition. This situation could have a positive contribution for the ongoing Meher agricultural activities and for water requirement of long and short cycle crops over western parts of the country. Moreover it could create conducive condition for the areas, which have not sown thier crops before due to moisture stress. However, some areas recorded heavy fall ranging from 42-69.3 in one rainy day. The recorded stations are Pawe, Adele, Ziway, Bilate, Gonder, Nekemte and Awassa recorded 42.2, 43.1, 44.2, 44.7, 48.1, 49.1 and 69.3 mm in one rainy day respectively. As a result of this some areas reported crop damage due to heavy fall. For instance Arfidae and Sawla reported crop damage on harvested teff, sorghum and maize crops; Pawe and DebreTabor reported damage on crops, which are found at early vegetative stage in the areas. Moreover, Jinka reported crop damage due to heavy fall and livestock like goats, sheep, cows and oxen has washed away by floods.

#### 1. WEATHER ASSESSMENT

## 1.1 June11-20, 2007

## 1.1.1 RAINFALL AMOUNT (Fig.1)

Only pocket area of central Oromia received 200-300mm rainfall. Some area of western and pocket areas of eastern and central Oromia, some part of southern and pocket area of northern Beshangul-Gumuz and pocket areas of southern and eastern SNNPR and eastern Amhara exhibited 100-200mm rainfall. Most parts of Beshangul –Gumuz, SNNPR and western, northern and southern Amhara, some parts of western, southern, eastern and pocket area of central Oromia and west of half part of Tigray experienced 50-100mm rainfall. All part of Gambela, some parts of western, eastern, central and southern Oromia, western Afar, western and eastern SNNPR, some part of eastern and tip of western Amhara and east of half part of Tigray received 25-50mm rainfall. Some parts of northwestern Afar, eastern Amhara, central, eastern and southern Oromia and northern Somali and pocket area of eastern SNNPR exhibited 5-25 rainfall. The rest parts of the country received little or no rainfall.

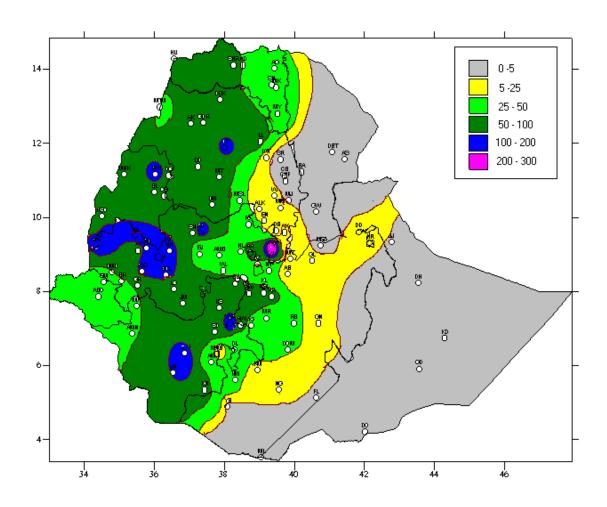


Fig 1. Rainfall distribution in mm (11- 20 June, 2007)

# 1.1.2 RAINFALL ANOMALY (Fig. 2)

All part of Afar, most part of Somali, some parts of eastern and southern and pocket area of central Oromia, some parts of eastern and western Amhara, western Tigray, some part of western and pocket area of eastern Beshangul-Gumuz and pocket areas of northern Gambela and eastern SNNPR received below normal to much below normal rainfall. The rest parts of the country exhibited normal to above normal rainfall.

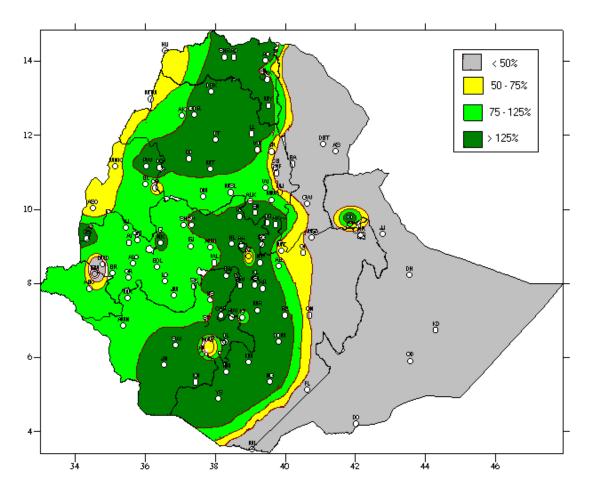


Fig.2 Percent of normal rainfall (11- 20 June, 2007)

Explanatory notes for the legend: <50 -- Much below normal 50—75% -- below normal 75—125% --- Normal > 125% ---- Above normal

## 1.1 TEMPERATURE ANOMALY

Some areas if eastern and north eastern parts of the country like DireDawa, Meisso Semera and Assayta , central like ShewaRobit, Methera , western and north western like Gambella Metema and Cheffa exhibited extreme maximum temperature ranging from 35-45.6  $^{0}$ C as high as 37.0, 36.0, 45.6, 43.6 36.8, 38.0, 35.0, 38.0 and 35.5  $^{0}$ C respectively.

### 2. WEATHER OUTLOOK FOR THE THIRD DEKAD OF JUNE 2007

Kiremt, rain bearing system are expected to strengthen while expanding toward north east Ethiopia in association with this, there are enhanced rainfall performance across much of south west, west, central, north and North West regions despite decreasing from southern margins. Generally, with the expectation of southern margins of SNNPR and Oromia as well as eastern Ethiopia, many places of Oromia SNNPR, Gambela, Benshangul- Gumuz, Amhara and Tigray with receive normal above normal rains. Where as eastern section of Amhara eastern Oromia, Dera Dawa, Hareri and central Somali with receive low rains that may cause below normal rainfall at some places. As the kiremt seasons already come out there are enhanced probability of gating heavy rains as the places of north west, central and west Ethiopia.

## 3. AGROMETEOROLOGICAL CONDITIONS AND IMPACT ON AGRICULTURE

## 3.1 VEGETATION CONDITION AND IMPACT ON AGRICULTURE

With the exception of Afar, some areas of northwestern and southeastern Amhara, eastern Oromia, central and southeastern Somali, and some areas of Benshangul-Gumuz, most parts of the country exhibited normal to above normal rainfall condition. This situation could have a positive contribution for the ongoing Meher agricultural activities and for water requirement of long and short cycle crops over western parts of the country. Moreover it could create conducive condition for the areas, which have not sown thier crops before due to moisture stress. However, some areas recorded heavy fall ranging from 42-69.3 in one rainy day. The recorded stations are Pawe, Adele, Ziway, Bilate, Gonder, Nekemte and Awassa recorded 42.2, 43.1, 44.2, 44.7, 48.1, 49.1 and 69.3 mm in one rainy day respectively. As a result of this some areas reported crop damage due to heavy fall. For instance Arfidae and Sawla reported crop damage on harvested teff, sorghum and maize crops; Pawe and DebreTabor reported damage on crops, which are found at early vegetative stage in the areas. Moreover, Jinka reported crop damage due to heavy fall and livestock like goats, sheep, cows and oxen has washed away by floods. Pursuant to crop phenological report, sowing of maize was under way in some areas of SNNPR (Mirab Abaya), while it was at emerging and ninth leaf stage in some areas of western Tigray (Shire), western Oromia (Sekoru), northeastern Benshangul-Gumuze (Pawe), eastern Benshangul-Gumuz (Chagni) and eastern Oromia (Gelemso). Moreover, it was at tasseling stage in some areas of western Oromia (Chira, Bedelle). Sorghum was at third leaf and tillering stage in some areas of western Oromia (Chira, Nedjo) and northeastern Benshangul-Gumuze (Pawe).

# 3.2 EXPECTED WEATHER IMPACT ON AGRICULTURE DURING THE COMING DEKAD

The anticipated normal to above normal rainfall condition over SNNPR, central and western Oromia, Gambela, Benishangul-Gumuz, western Amhara and western Tigray would favor for water requirement of crops which are found at different phenological stage in Meher growing areas. Besides it would have a significant contribution in areas, which is a time for sowing of wheat, Barley, Beans and Peas in the areas of Arsi Robe Ambo, Adama, Kulumsa, Shambu, Nekemte and Gimbi. The expected near normal rainfall condition over eastern Tigray, eastern Amhara, eastern Oromia and Northern Somali would have a positive impact for lately sown Belg crops and crops which have not attain their maturity. However it would have a negative impact for crops, which have, attain their maturity and ready for harvest. Therefore, farmers must harvest their crops from the field beforehand. The anticipated below normal rainfall condition in some areas of the aforementioned areas would have a negative impact on the normal growth and development of the plant. Besides this erratic condition would create a favorable condition for crop pest and disease. Thus, proper attention and follow up should be given for the aforementioned low land areas.