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FORE WARD

This Agro met Bulletin is prepared and disseminated by the National Meteorological Agency (NMA). The aim is to provide those sectors of the community involved in Agriculture and related disciplines with the current weather situation in relation to known agricultural practices.

The information contained in the bulletin, if judiciously utilized, are believed to assist planners, decision makers and the farmers at large, through an appropriate media, in minimizing risks, increase efficiency, maximize yield. On the other hand, it is vital tool in monitoring crop/ weather conditions during the growing seasons, to be able to make more realistic assessment of the annual crop production before harvest.

The Agency disseminates ten daily, monthly and seasonal weather reports in which all the necessary current information's relevant to agriculture are compiled.

We are of the opinion that careful and continuous use of this bulletin can benefit to raise ones agro climate consciousness for improving agriculture-oriented practices. Meanwhile, your comments and constructive suggestions are highly appreciated to make the objective of this bulletin a success.

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በጁን የመጀመሪያዎቹ አሥር ቀናት የክረምት ዝናብ በመጠናከር የአገሪቱን ምዕራብዊ አጋማሽ ከማዳረሱ ጋር ተያይዞ በምዕራብ፣ በደቡብ ምዕራብ፣ በሰሜን ምዕራብና የመካከለኛው የሀገሪቱ ክፍሎችን ጨምሮ በምሥራቅና በደቡብ የሀገሪቱ ከፍተኛ ሥፍራዎች ከ32-58 ሚሜ ዝናብ በአንድ ቀን ዝናብ አግኝተዋል። ይህም ሁኔታ ዘግይቶ ተዘርተው በተለያየ የእድገት ደረጃ ላይ ለሚገኙ የበልግ ሰብሎችና በአካባቢው ለሚበቅሉት ቋሚ ተክሎች የውሃ ፍላጎት መሟላት፣ ለመኸር ሰብሎች ማሣ ዝግጅትና ቀደም ብሎ ለተዘሩት የረጅም ጊዜ ሰብሎች እንደ ዳጉሳ፣ በቆሎና ማሽላ ለመሳሰሉት እንዲሁም በአርብቶ አደሩና ከፊል አርብቶ አደሩም አካባቢ ለግጦሽ ሣርና ለመጠጥ ውሃ አቅርቦት ጠቀሜታ ነበረው።

በጁን ሁለተኛ አስር ቀናት በመጠንም ሆነ በሥርጭት የተስተካከለ ዝናብ በአብዛኛው የክረምት ዝናብ ተጠቃሚ በሆኑት በአብዛኛው ትግራይ፣ አማራ፣ ቤንሻንጉል ጉምዝ፣ ጋምቤላና በደቡብ ብሔር ብሔረሰቦች እና ህዝቦች ክልል ከ 50-125 ሚሜ ዝናብ ለተከታታይ ቀናት አግኝተዋል። ይህም ሁኔታ ለወቅቱ የእርሻ ስራ እንቅስቃሴ ለማሣ ዝግጅትና ለዘር ስራ፣ ቀደም ብለው ለተዘሩት የመኸር ሰብል፣ የረጅም ጊዜ ሰብሎች እንደ ዳጉሳ፣ በቆሎና ማሽላ ለመሳሰሉት የውሀ ፍላጎት መሟላት እንዲሁም በአርብቶ አደሩና ከፊል አርብቶ አደሩም አካባቢ ለግጦሽ ሣርና ለመጠጥ ውሃ አቅርቦት ጠቀሜታ ነበረው።

በጁን ሶስተኛው አስር ቀናት የክረምት ዝናብ ከመጠናከሩ ጋር ተያይዞ በአብዛኛው የክረምት ዝናብ ተጠቃሚ በሆኑት በአማራ፣ በትግራይ፣ በአብዛኛው ኦሮሚያ፣ በጋምቤላ፣ በቤንሻንጉል-ጉምዝ እና በደበብ ብሔር ብሔረሰቦች እና ህዝቦች ክልል ከቀላል እስከ ከባድ መጠን ያለው ዝናብ አግኝተዋል። የዝናብም መጠን በአንዳንድ በታዎቹ ላይ ከ32-59 ሚሊ ሜትር የሚደርስ ዝናብ በአንድ ቀን አግኝተዋል። ከላይ በተጠቀሱት አካባቢዎች የተገኘው ዝናብ በአካባቢው ለሚበቅሉት ቋሚ ተክሎች፣ ቀደም ብለው ለተሚዘሩት የረጅም ጊዜ የአገዳ ሰብሎች እንደ በቆሎና ማሽላ ለመሳሰሉት የውሃ ፍላጎት መሟላት፣ ለመኸር ሰብሎች የማሣ ዝግጅትና የዘር የእርሻ ስራ እንቅስቃሴ እንዲሁም ለአርብቶ አደሩና ከፊል አርብቶ አደሩ አካባቢ ለግጦሽ ሣርና ለመጠጥ ውሃ አቅርቦት ጠቀሜታ ነበረው።

በአጠቃላይ በጁን ወር የክረምት ዝናብ ከመጠናከሩ ጋር ተያይዞ ከጁን ሁለተኛ አስር ቀናት ጀምሮ በደቡብ ምዕራብና በምዕራብ የሀገሪቱ ክፍሎች ላይ ተወስኖ የነበረው ዝናብ ወደ አብዛኛው የክረምት ዝናብ ተጠቃሚ የሀገሪቱ ክፍሎች ተስፈፍቶ ታይቷል። ከዚህም የተነሳ ባሳለፍነው የሰኔ ወር አማራ፣ ትግራይ፣ አብዛኛው ኦሮሚያ፣ ጋምቤላ፣ ቤንሻንጉል ጉምዝ እና በደቡብ ብሔር ብሔረሰቦች እና ህዝቦች ክልል ከቀላል እስከ ከባድ መጠን ያለው ዝናብ አግኝተዋል። የዝናብም መጠን በአንዳንድ በታዎቻቸው ላይ ከ35.0-58.6 ሚሊ ሜትር የሚደርስ ከባድ ዝናብ በአንድ የዝናብ ቀን ነበራቸው። የዝናቡ አጀማመር በአብዛኛው መልኩ መደበኛ ፈሩን የተከተለ እና በመጠንም ሆነ በስርጭት ረገድ ጥሩ ስለነበረ ለወቅቱ የእርሻ ስራ እንቅስቃሴ ለማሳ ዝግጅትና ለዘር እንዲሁም በበልግ ወቅት ተዘርቶ በተለያየ የዕድገት ደረጃ ላይ ለሚገኙ የረጅም ጊዜ የመኸር ሰብሎቸና ለቋሚ ተክሎች የውሃ ፍላጎት መሟላትና ለአርብቶ አደሩና ከፊል አርብቶ አደሩ አካባቢ ለግጦሽና ለመጠጥ ውሃ አቅርቦት የጎላ ጠቀሜታ ነበረው። በሌላ በኩል አንዳንድ ቦታዎች ላይ የጣለው ከባድ ዝናብ ምንም እንኳን የደረሰ ሪፖርት ባይኖርም የአፈር መሸርሸር እና በሰብሎቸ ላይ መጠነኛ ጉዳት እንደሚያደርስ ይታመናል ።

SUMMARY

JUNE 2014

During the first dekad of June 2014, rain bearing meteorological phenomena brings better rainfall amount over western portion of the country as a result western, southwestern, northwestern as well as high lands of eastern and southern parts of the country experienced normal to above normal rainfall. More over Gambela, SNNPR, southern Tigray, western Amhara, Beshangul-Gumuz, western and central Oromia exhibited rainfall ranging from 30.1-236.8 mm for 5-10 days. The situation favored Meher agricultural activities, such land preparation and sowing *of* Meher crops in areas where Meher crops normally sown early, water satisfaction for perennial plants and long cycle crops and availability of pasture and drinking water over pastoral and agro pastoral areas of the country.

During the second dekad of June 2014, due to the strengthening of Kiremt rain bearing meteorological phenomenon, better rainfall in amount and distribution prevailed over much of kiremt rain benefiting areas of the country such as much of Tiray, Amhara, northern Benshagul-gumuz, western, central and southern Oromia and SNNPR received rainfall ranging from 50-120 mm for 6-10days while eastern Tigray, Amhara and Behsangul-Gumuz, western Oromia and Gambela exhibited ranging from 5-50mm of rainfall for 2-6 days. The situation might have a positive impact on on-gowning seasonal agricultural activities such as land preparation, sowing of Meher crops, water requirement for long cycle Meher crops found at different growing phase, perennial plants, pasture and drinking water availability over pastoral and agro pastoral areas of the country.

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During the third decade of June 2014, rain bearing meteorological phenomena farther strengthened over much of kiremt rain benefiting areas of the country. As a result, Amhara, Tigray, Gambella, Benshangul-gumz, western, central and southern Oromia, northern portion of SNNPR received light to heavy rainfall ranging 25 to 185 mm of rainfall for 5 to 10 days. While eastern Tigray, eastern Amhara, SNNPR, high lands of southern Oromia and eastern parts of the county including northern Somalia experienced 5-25 mm in 1 to 5 days. Heavy falls ranging from 32.6-45.6 mm in one rainy day was reported over Shawra, Arjdo, Chagni, Ginbi, Ejaje, Kachise, Bullen, Gore, Shambu, Bedele, Alage, Nekemt and Mash. Thus, the situation might have favored Meher agricultural activities such as land preparation and sowing Meher crops, water requirement for long cycle crops that are found at different growing phase, perennial plants, improvement of pasture and drinking water availability over pastoral and agro pastoral areas of the country.

During the previous month June 2014 the first ten days the rainfall activity are concentrate over western and southwestern parts of the country. While during the second and third decade of the month Kerimt rain bearing meteorological phenomena was strengthened in amount and distribution over Kiremt rain benefiting of northern, western and central Ethiopia received heavy rainfall ranging 50-333.0mm for 8 to 28 days. Northeastern and eastern parts of the country exhibited light rainfall rainging from 5to 50.0mm for 3 to 14 days. In general western Tigray, western Amhara, Benshangulu-Gumuz, high land of southern and western Oromia and SNNPR exhibited normal to above normal rainfall while the rest parts of the country receive below normal rainfall. Thus, the situation might have favored Meher agricultural activities such as land preparation and sowing Meher crops, water requirement for long cycle crops that are found at different growing phase, perennial plants, improvement of pasture and drinking water availability over pastoral and agro pastoral areas of the country.

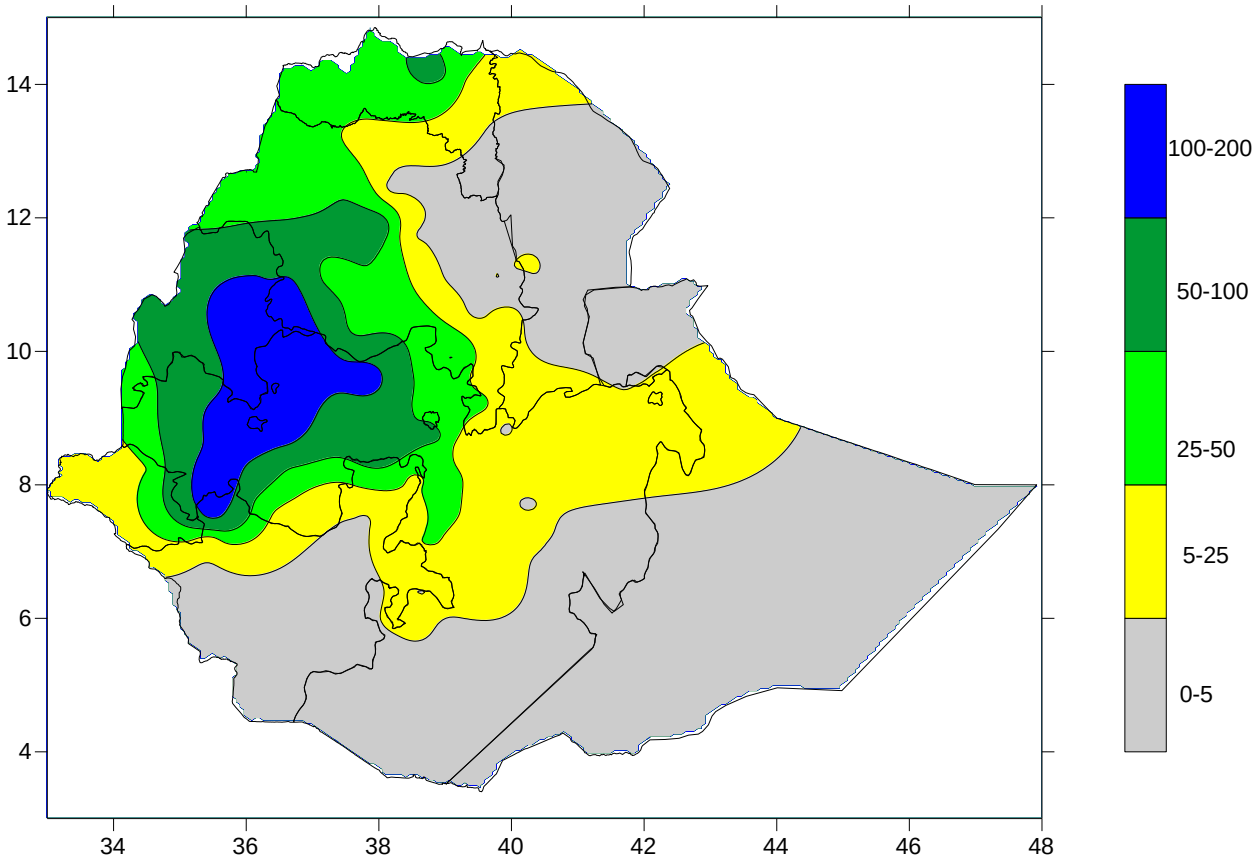


Fig 1. Rainfall distribution in mm (21 – 30 June 2014)

1. WEATHER ASSESSMENT

1.1. Rainfall amount (Fig.1)

Some areas of eastern Benshangul-Gumuz and adjoin areas of southern Amhara and pocket areas of northwestern Oromia exhabited 100-200mm of rainfall. Pocket areas of northern Tigray, and some places of southwestern Amhara, Benshangul-Gumuz and southwestern Oromia, exhibited 50-100 mm of rainfall. Much of western Tigray, western and eastern Amhara, central Oromia, eastern Gambela and southern Beshangul –Gumuz, received 25-50 mm of rainfall. Some parts of northern and southern Afar, eastern Tigray and northern, central and southern Amhara, much of Gambela, eastern, central and northern SNNPR and central Oromia experienced 5-25 mm of rainfall. The rest parts of the country exhibited little or no rainfall.

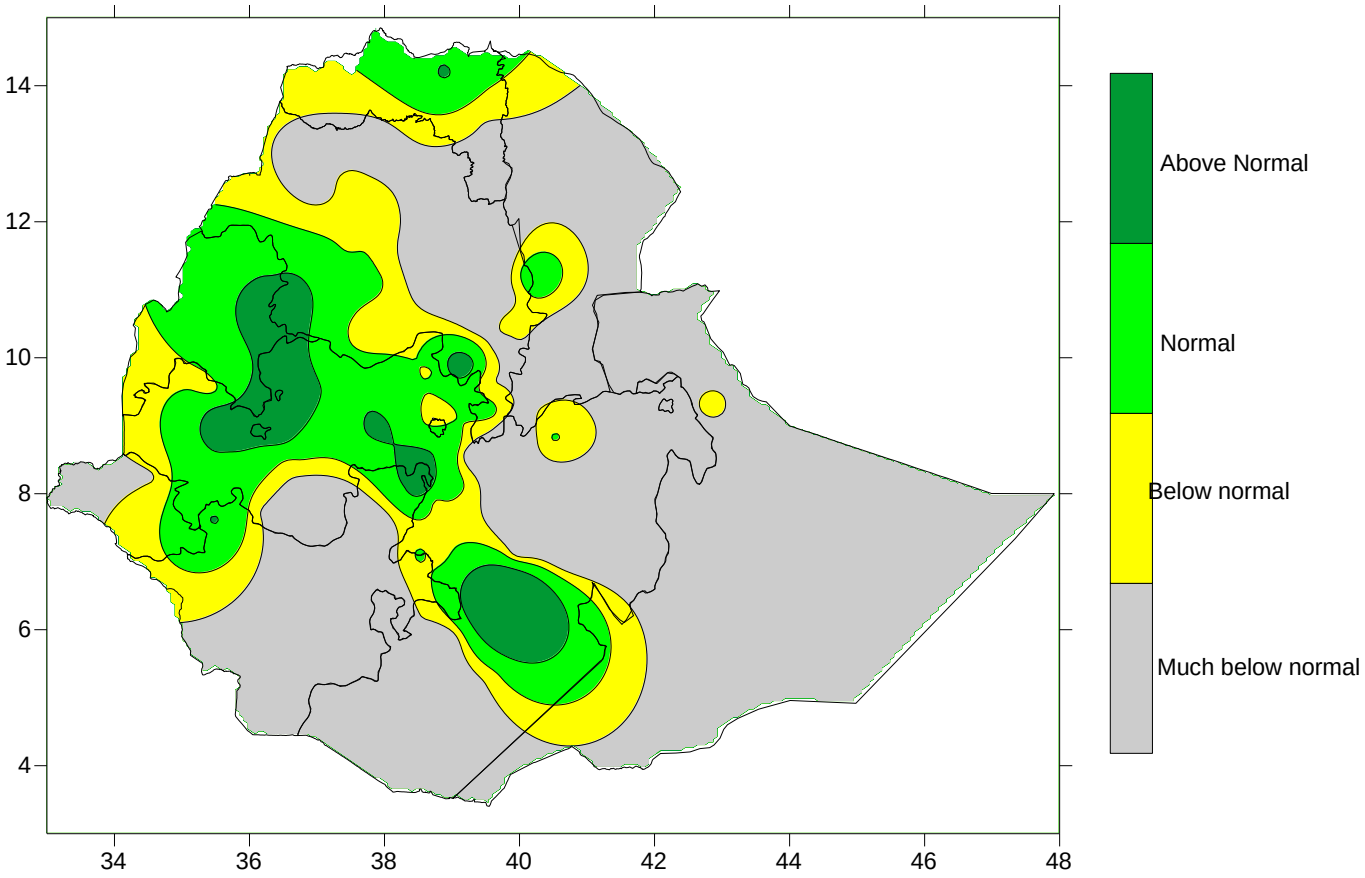


Fig. 2 Percent of normal rainfall distribution (21-30 June 2014)

Explanatory notes for the Legend

< 50-Much below normal
50-75%-Below normal
75-125%- Normal
> 125% - Above normal

1.1.2 Rainfall Anomaly (Fig. 2)

Some parts of northern Tigray, southern Amahara, Benshangul-Gumuz, western, central and southeastern Oromia and eastern Gambela and northern SNNPR exhibited normal to above normal rainfall. The rest parts of the country received below normal to much below normal rainfall.

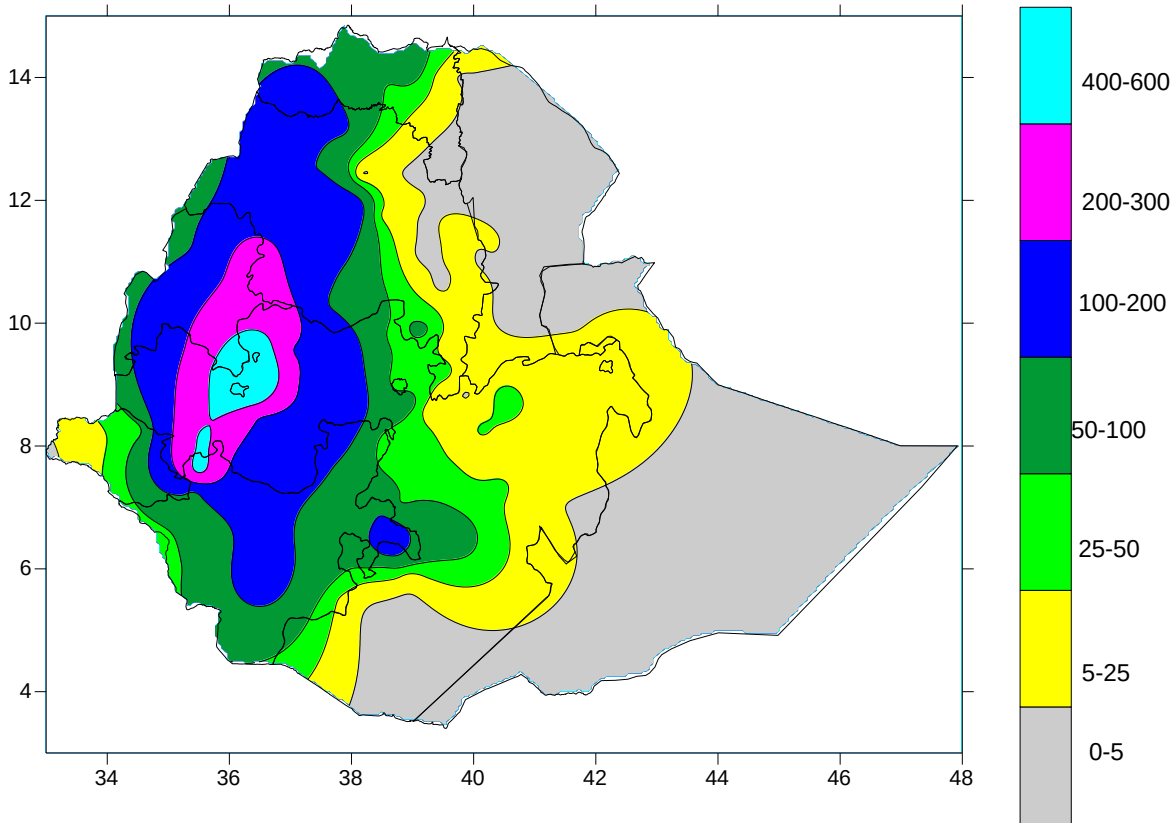


Fig. 3 Rainfall amount in mm for the month of June 2014

1.2.1 Rainfall amount (Fig.3)

Some parts of northwestern Oromia and adjoining areas of Benshangul-Gumuz and pocket areas of southwestern Oromia exhibited 200-400 mm of rainfall. Some parts of southwestern Oromia, eastern Benshangul-Gumuz, and parts of northeastern SNNPR experienced 100-200 mm of rainfall. Some places of western Tigray, central and western Amhara. Western Gambella, western and central Oromia exhibited 100-200 mm of rainfall. Much western Bensangul-Gumuz, central Gambela, much of SNNPR, western, central and southern Oromia received 50-100 mm of rainfall. Much of eastern, southern and southeastern Oromia and western Gambel received 25-50 mm of rainfall. Much of eastern and southeastern Oromia, central Somalia, western Gambela, southern and eastern Amhara, eastern Tigray and southern and northern tip of Afar exhibited 5-25mm of rainfall. The rest parts of the country exhibited little or no rainfall.

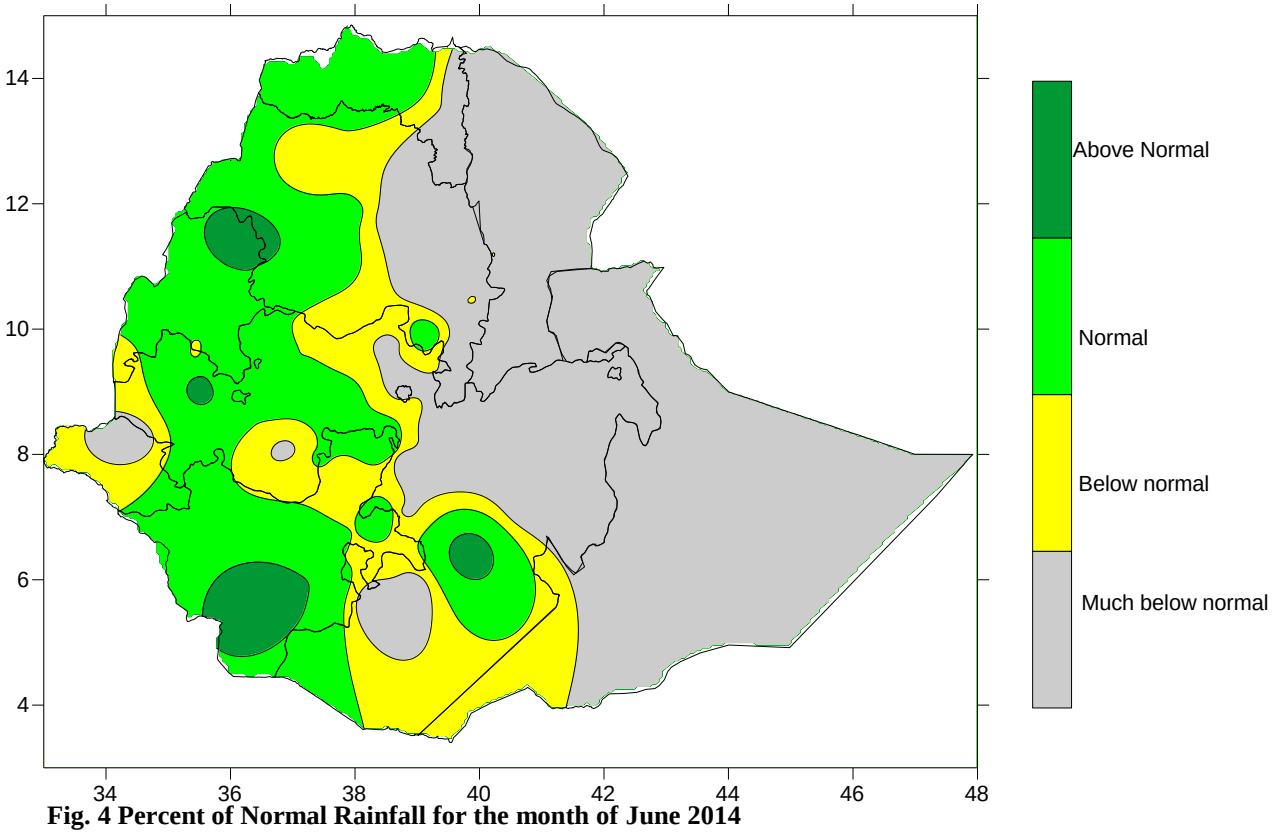


Fig. 4 Percent of Normal Rainfall for the month of June 2014

Explanatory notes for the Legend:

< 50 -Much below normal
50-75%- Below normal
75-125%- Normal
> 125% - Above normal

1.2.2 Rainfall Anomaly (Fig. 4)

Much of western Tigray, western and southern Amhara, Benshangul-Gumuz, southwestern and southeastern Oromia, SNNPR, eastern Gambela exhibited normal to above normal rainfall. The rest parts of the country received below normal to much below normal rainfall.

1.3 TEMPERATURE ANOMALY

During the month under review, some stations found in the lowlands of the country exhibited extreme maximum temperature above 35^{o}C. Among reporting stations: Dire Dawa, Gode, Methara, Cheffa, Elider, Gambela, Gewane, Majete, Meiso, Quara, Semera and Tsitsika recorded 37.4, 36.6, 39.5, 40.5, 36.9, 43.7, 36.0, 42.8, 35.7, 36.2, 35.5, 44.8 and 36.4 ^{o}C respectively during the decade. The condition might have caused a negative impact on the normal growth and developments of plants and animals.

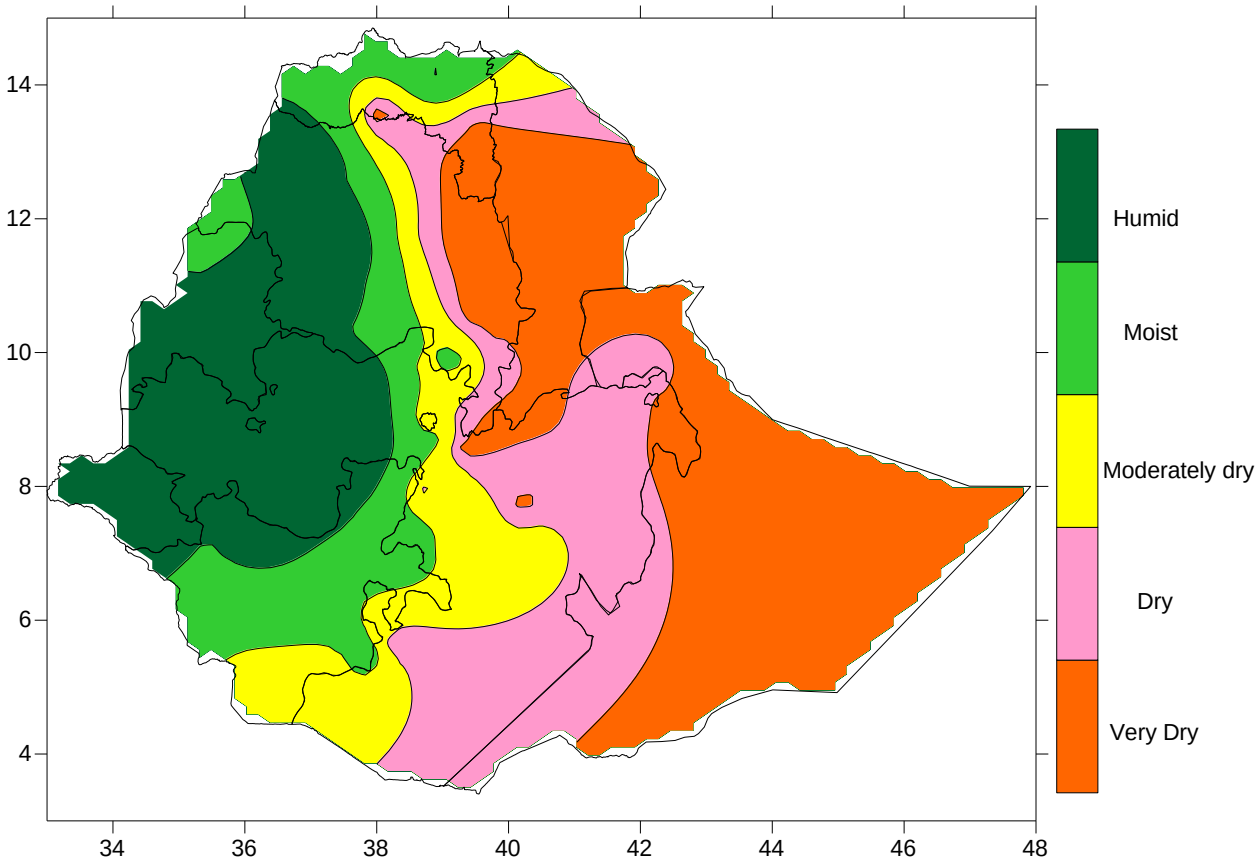


Fig. 5 moisture status for the month of June 2014

As indicated on the moisture status map above, Benshagul-Gumuz, Gambela, SNNPR, western half of Amhara, western Oromia, northern half and western Tigray experienced humid to moist condition, while southern tip of SNNPR, eastern and central Tigray, pats of southern Amhara and central parts of the country received moderately dry condition. The situation might have favored Mehere agricultural activities, availability of drinking water and pasture, water requirement of long cycle crops. While the rest parts of the country exhibited dry to very dry moisture condition which causes a negative impact for the ongoing Mehere agricultural activities .

2. AGROMETEOROLOGICAL CONDITIONS AND IMPACT ON AGRICULTURE

2.1 VEGETATION CONDITION AND IMPACT ON AGRICULTURE

The rainfall activity during June 2014 rain bearing meteorological phenomena farther strengthened over much of kiremt rain benefiting areas of the country. As a result, Amhara, Tigray, Gambella, Benshangul-gumz, western, central and southern Oromia, northern portion of SNNPR received light to heavy rainfall ranging 25 to 185 mm of rainfall for 5 to 10 days. While eastern Tigray, eastern Amhara, SNNPR, high lands of southern Oromia and eastern parts of the county including northern Somalia experienced 5-25 mm in 1 to 5 days. Heavy falls ranging from 32.6-45.6 mm in one rainy day was reported over Shawra, Arjo, Chagni, Gimbi, Ejaje, Kachise, Bullen, Gore, Shambu, Bedele, Alage, Nekemt and Mash. Thus, the situation might have favored Meher agricultural activities such as land preparation and sowing Meher crops, water requirement for long cycle crops that are found at different growing phase, perennial plants, improvement of pasture and drinking water availability over pastoral and agro pastoral areas of the country.

2.2 EXPECTED WEATHER IMPACT ON AGRICULTURE DURING THE COMING MONTH

In the coming month July 2014, Kiremt rain bearing meteorological phenomena will expected farther strengthen over kiremt rain benefiting areas of the country. As a result of this, western Tigray, western Amhara, Benshangul- Gumuz, Gambela, western and central Oromia and SNNPR will expect normal to above normal rainfall. In some place of the aforementioned areas anticipated have heavy rainfall that might have a probability of getting flash flood and river over flow. Hence farmers and the concerned bodiea should give attention to minimize the risk. While eastern Tigray, eastern Amhara, high lands of southern Oromia, eastern parts of the country, Afar and northern Somalia will expect near normal rainfall. Thus the situation will favor the seasonal agricultural activities, water requirement for perennial plants and long cycle crops and availability of pasture and drinking water over pastoral and agro pastoral areas of the country. We would like to give advice for the farmers and concerned bodies to utilize the available moisture properly by using different mechanisms and techniques of water conservation for farther use.

DEFNITION OF TERMS

ABOVE NORMAL RAINFALL: - Rainfall in excess of 125% of the long term mean

BELOW NORMAL RAINFALL: - Rainfall below 75 % of the long term mean.

NORMAL RAINFALL: - Rainfall amount between 75 % and 125 % of the long term mean.

BEGA: - It is characterized with sunny and dry weather situation with occasional falls. It extends from October to January. On the other hand, it is a small rainy season for the southern and southeastern lowlands under normal condition. During the season, morning and night times are colder and daytime is warmer.

BELG: - Small Rainy season that extends from February to May and cover s southern, central, eastern and northeastern parts of the country.

CROP WATER REQUIREMENTS: - The amount of water needed to meet the water loss through evapotranspiration of a disease free crop, growing under non-restricting soil conditions including soil water and fertility.

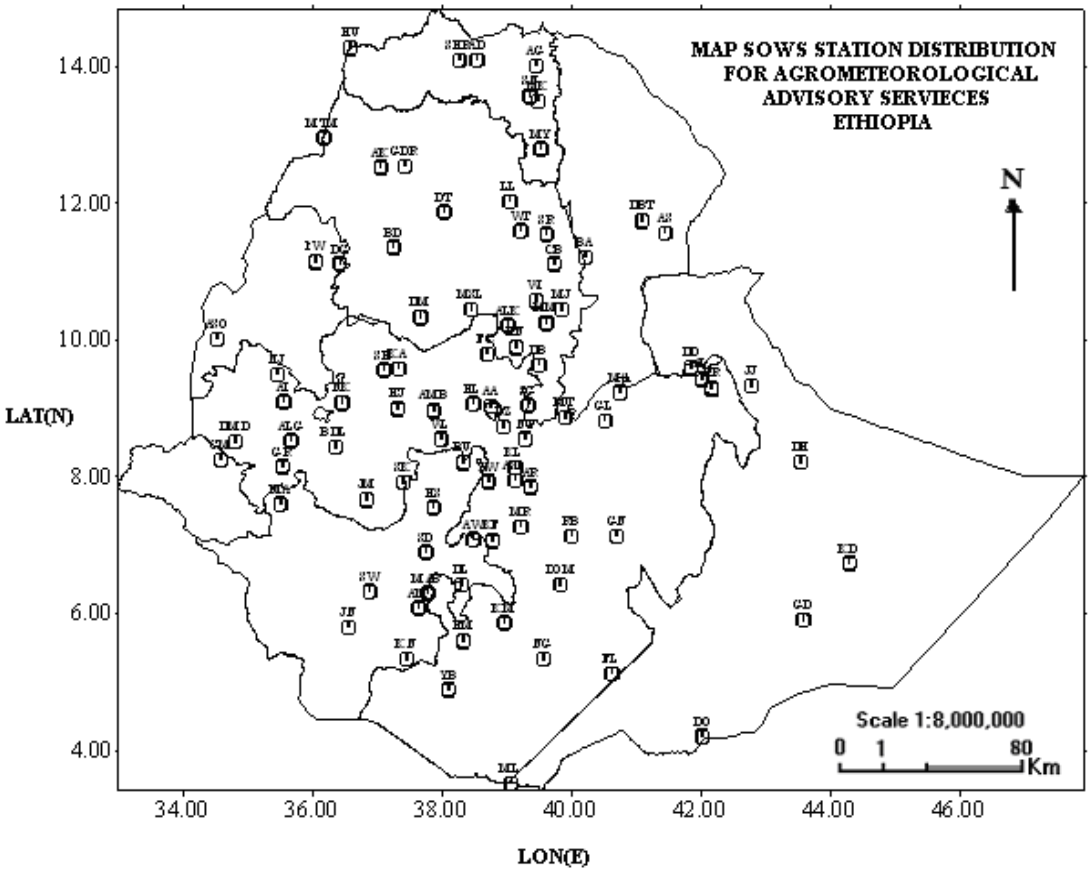
DEKAD: - First or second ten days or the remaining days of a month.

EXTREME TEMPERATURE: - The highest or the lowest temperature among the recorded maximum or minimum temperatures respectively.

ITCZ: - Intertropical convergence zone (narrow zone where trade winds of the two hemispheres meet.

KIREMT: - Main rainy season that extends from June to September for most parts of the country with the exception of the southeastern lowlands of the country.

RAINY DAY: - A day with 1 or more mm of rainfall amount.



Station	**CODE**	D. Markos	DM	Hossaina	HS	M/Selam	MSL
A. Robe	AR	D. Zeit	DZ	Humera	HU	Nazereth	NT
A.A. Bole	AA	D/Dawa	DD	Jijiga	JJ	Nedjo	NJ
Adigrat	AG	D/Mena	DOM	Jimma	JM	Negelle	NG
Adwa	AD	D/Odo	DO	Jinka	JN	Nekemte	NK
Aira	AI	D/Tabor	DT	K.Dehar	KD	Pawe	PW
Alemaya	AL	Dangla	DG	K/Mingist	KM	Robe	RB
Alem Ketema	ALK	Dilla	DL	Kachise	KA	Sawla	SW
Alge	ALG	Dm.Dolo	DMD	Koffele	KF	Sekoru	SK
Ambo	AMB	Dubti	DBT	Konso	KN	Senkata	SN
Arba Minch	AM	Ejaji	EJ	Kulumsa	KL	Shambu	SH
Asaita	AS	Enwary	EN	Lalibela	LL	Shire	SHR
Asela	ASL	Fiche	FC	M.Meda	MM	Shola Gebeya	SG
Assosa	ASO	Filtu	FL	M/Abaya	MAB	Sirinka	SR
Awassa	AW	Gambela	GM	Maichew	MY	Sodo	SD
Aykel	AK	Gelemso	GL	Majete	MJ	Wegel Tena	WT
B. Dar	BD	Ginir	GN	Masha	MA	Woliso	WL
Bati	BA	Gode	GD	Mekele	MK	Woreilu	WI
Bedelle	BDL	Gonder	GDR	Merraro	MR	Yabello	YB
BUI	BU	Gore	GR	Metehara	MT	Ziway	ZW
Combolcha	CB	H/Mariam	HM	Metema	MTM		
D. Berehan	DB	Harer	HR	Mieso	MS		
D. Habour	DH	Holleta	HL	Moyale	ML		