

National Drought Management Authority MARSABIT COUNTY DROUGHT EARLY WARNING BULLETIN FOR JUNE 2021



A Vision 2030 Flagship Project



DROUGHT EW PHASE: ALERT

Drought Status: ALERT



Maandalizi ya mapema

Drought Situation & EW Phase Classification

Biophysical Indicators

Rainfall: In the month under review, the County generally remained dry with exception of Moyale Township which received light showers in 2 days. Generally, County posted two consecutive failure of rainy seasons.

Vegetation condition: 3-months Vegetation Condition Index for the month under review was 32.97 across the county hence remained when compared to the previous months VCI of 32.57. Vegetation condition index was below average for two successive months.

Socio-Economic Indicators (Impact Indicators)

Production indicators: Livestock body condition was good-fair in all the livelihood zones. Milk production declined and was below the short term average. Livestock migrated to the dry season grazing areas. Area under crop production is below the long-term average with a potential near total crop failure in Saku while near average harvest anticipated in Moyale Sub-county. No livestock deaths were recorded as a result of the dry spell.

Access indicators: Household and livestock water distances increased across the County due to below average water recharge levels. Milk consumption was below the short-term average and terms of trade deteriorated across the livelihood zones. Maize prices were above normal while goat prices were slightly below the short term average.

Utilization indicators. Household food consumption score remained in the acceptable food consumption hand while households

Early Warning (EW) Phase Classification

Livelihood Zone	Phase	Trend
Agro-pastoral	Alert	Stable
Pastoral All species	Alert	Worsening
Fisher folk/Casual labour/Petty Trading	Alert	Worsening
County	Alert	Worsening
Biophysical Indicators	Value	Normal Range/Value
Rainfall (% of Normal)	36	80 -120
VCI-3Month (County)	32.97	>35
Forecast (VCI-3Month)		>35
Forecast soil moisture	0.2	< 0.2
Production indicators	Value	Normal
Livestock Body Condition	Good-Fair	Good
Milk Production	1.0	>1.9Litres
Livestock Migration Pattern	Unusual	Normal
Livestock deaths (from drought)	No death	No death
Access Indicators	Value	Normal
Terms of Trade (ToT)	71	>74
Milk Consumption	0.75	>1.75 Litres
Return distance to water	7.0	0.0-7.9Km
Utilization indicators	Value	Normal
Nutrition Status (malnourished)	11.5	0.0-8.85
Coping Strategy Index	18.04	<18
Food Consumption	42.8	>35

<ul style="list-style-type: none"> ▪ Short rains harvests ▪ Short dry spell ▪ Reduced milk yields ▪ Increased HH Food Stocks ▪ Land preparation 			<ul style="list-style-type: none"> ▪ Planting/Weeding ▪ Long rains ▪ High Calving Rate ▪ Milk Yields Increase 			<ul style="list-style-type: none"> ▪ Long rains harvests ▪ A long dry spell ▪ Land preparation ▪ Increased HH Food Stocks ▪ Kidding (Sept) 			<ul style="list-style-type: none"> ▪ Short rains ▪ Planting/weeding 		
Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sept	Oct	Nov	Dec

1.0 CLIMATIC CONDITIONS
1.1 RAINFALL PERFORMANCE

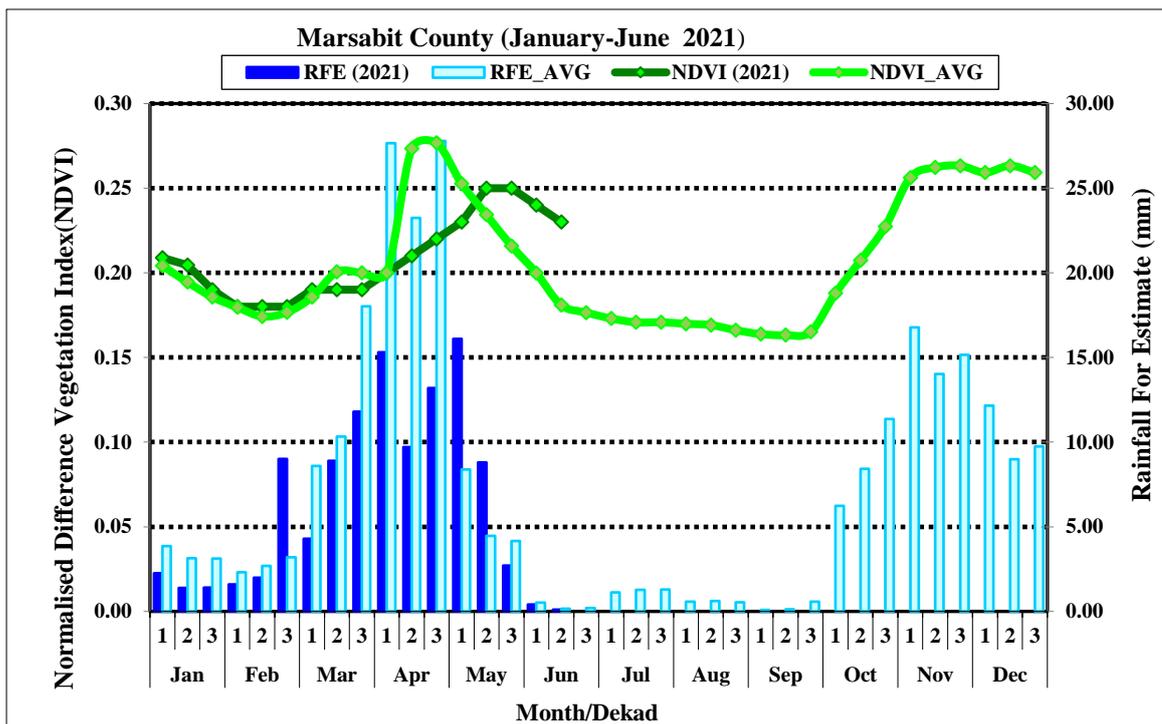


Figure 1: Dekadal Rainfall (mm) and NDVI values compared to the Long Term Average
Source: WFP-VAM, CHIRPS/MODIS

- From the figure 1 shown above, dekadal rainfall for estimate (RFE) amounts for the first and second dekads were normal when compared to their respective long-term dekadal rainfall for estimate (RFE) averages.
- Normalized Difference Vegetation Index (NDVI) for the first and second dekads were above average when compared to their corresponding long term dekadal NDVI values.

1.2 CUMULATIVE RAINFALL

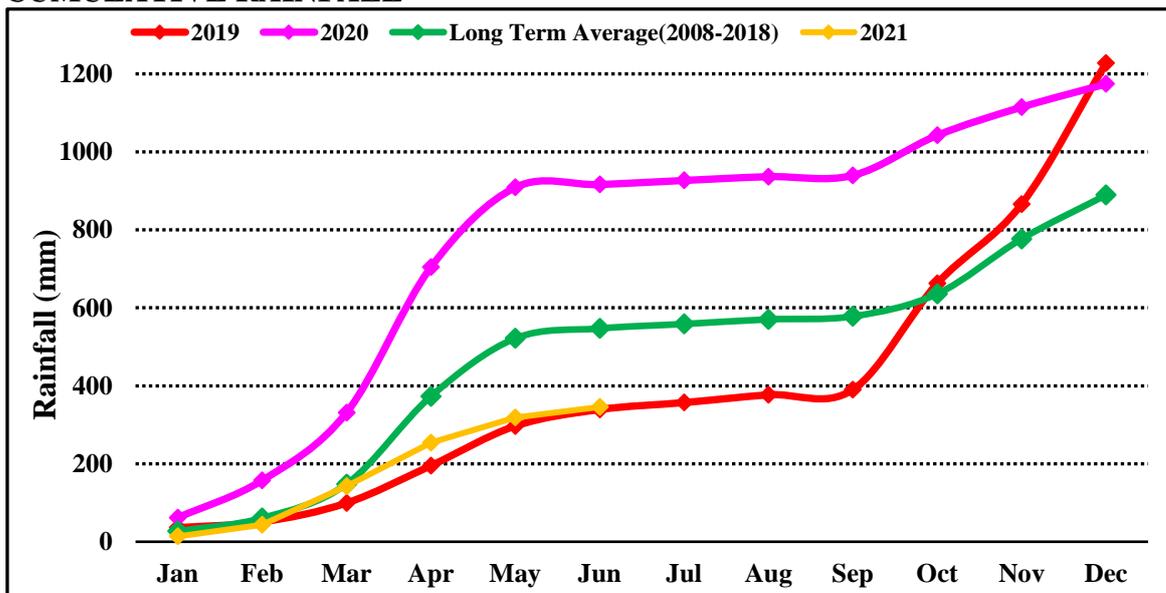


Figure 2: Cumulative Rainfall Performance (mm)

- From the figure (2) shown above, seasonal cumulative long rains are significantly below the long-term cumulative rainfall amounts with a paltry 36percent of the normal long rains

received. It can be deduced that the 2019 long rains failed and was remarkably below the long term average while 2020 long rains were at an all-time high when compared to the long term average (MAM). In the months of March and April, the rains were suppressed and poorly distributed across the County. However, the long rains peaked in the month of May and were enhanced in Moyale Sub-county. The depressed rains in March and April crowded out the enhanced rains received in May hence seasonal cumulative rainfall shortfalls recorded and equated to the 2019 long rains which was a typical abnormally dry season. By and large, the two consecutive rainy seasons have failed.

2.0 IMPACTS ON VEGETATION AND WATER

2.1 VEGETATION CONDITION

2.1.1 Vegetation Condition Index (VCI)

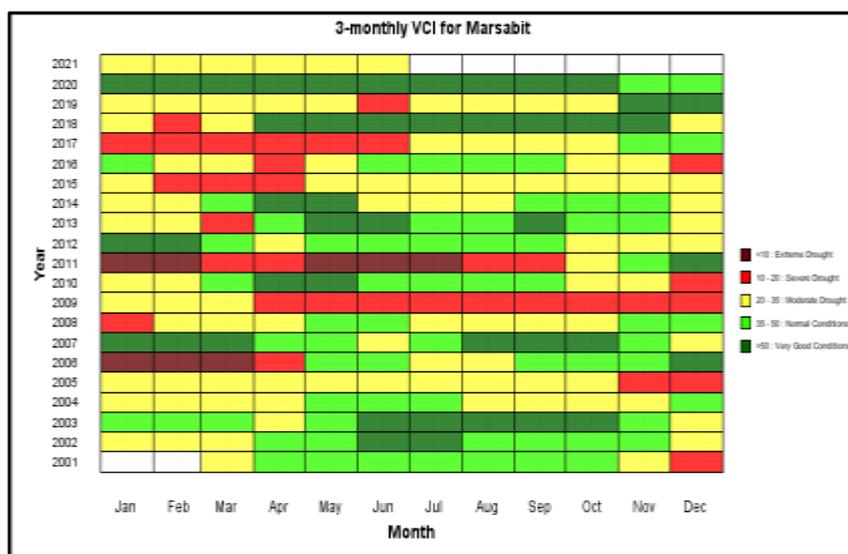


Figure 3: Vegetation Condition Index Matrix across Marsabit County

- The current vegetation condition index is 32.97 hence illustrated no change when likened to the preceding month's vegetation condition index of 32.57 attributed to cumulative failure of the long rains. The 3-months vegetation condition index stagnated in the moderate category as the cumulative rains received had

negligible causal effect on forage invigoration. With expected persistence of the forecasted drier than usual conditions, the 3-months vegetation condition index will reduce and possibly shift to the severe vegetation deficit band in July.

- When compared based on the Sub-counties, Moyale, Saku and North Horr had 3-months vegetation condition index of 41.93, 35.25 and 35.09 respectively thus remained in the normal vegetation greenness band. However, Laisamis Sub-county VCI significantly declined from 48.59 (normal vegetation greenness) in May to 24.94 (moderate vegetation deficit) in June prompted by remarkably below normal long rains received when compared to other Sub-counties.

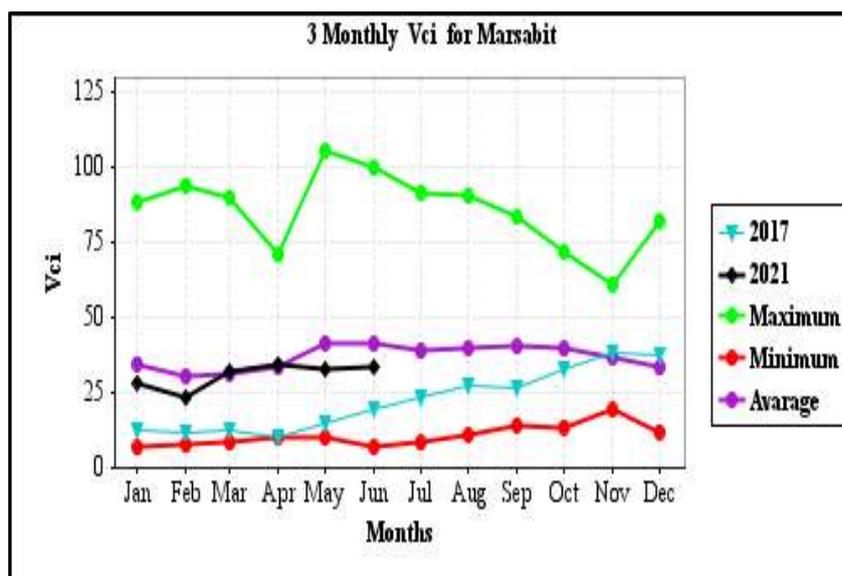


Figure 4: Vegetation Condition Index Trends

- Figure (4) shown above compares June 2021 vegetation condition index to June long term average, historical maximum and minimum vegetation condition index values. The current vegetation condition index falls below the long term average attributed to failure of the long rains and with likely persistence of drier than usual conditions, vegetation condition index will reduce further and fall below the long term average in July.
- Sub-counties vegetation condition index forecasts in Figure (5) below indicates that Laisamis

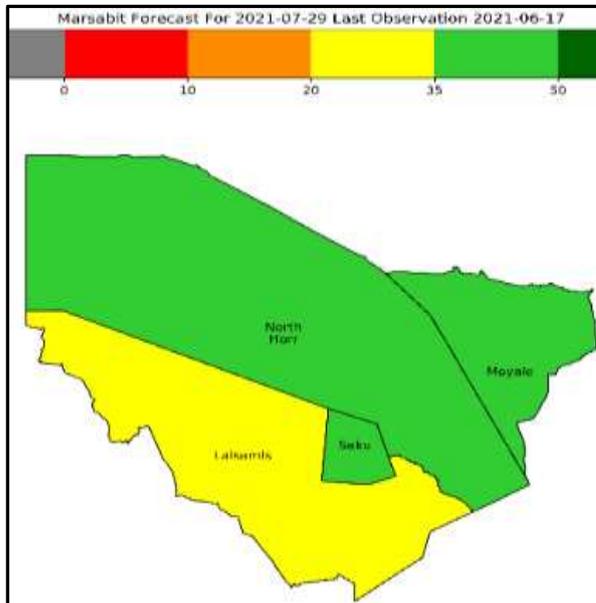


Figure 5: 3-Months VCI Forecast by Sub-County

shifted towards the moderate vegetation deficit category while Saku, Moyale and North Horr Sub-counties remained in the normal vegetation greenness band in June. Notably, Moyale Sub-county posted high likelihood improvement of vegetation condition due to the spill over effect of the near average long rains received.

- (Figure 7) depicts forecasted soil moisture that indicates a likelihood deterioration across the County during the long dry spell period due

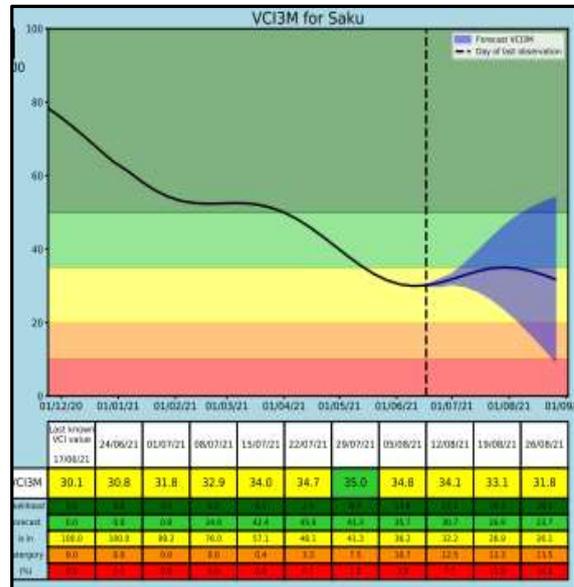


Figure 6: Saku Sub-County 3-months VCI

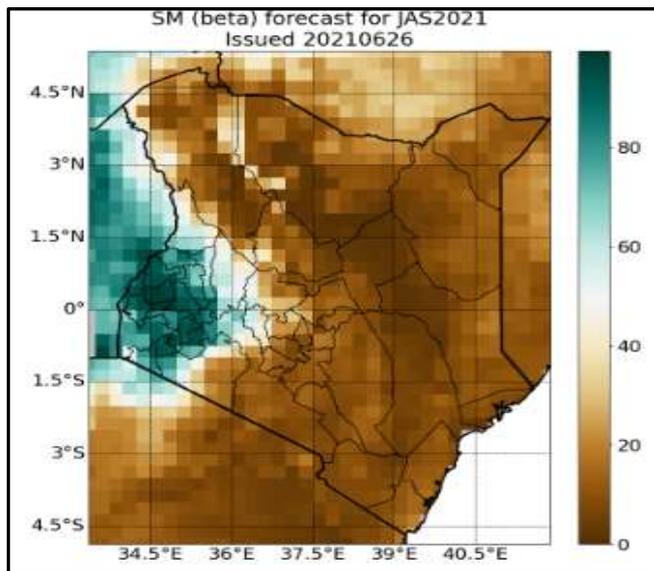


Figure 7: Probability of lower tercile soil moisture

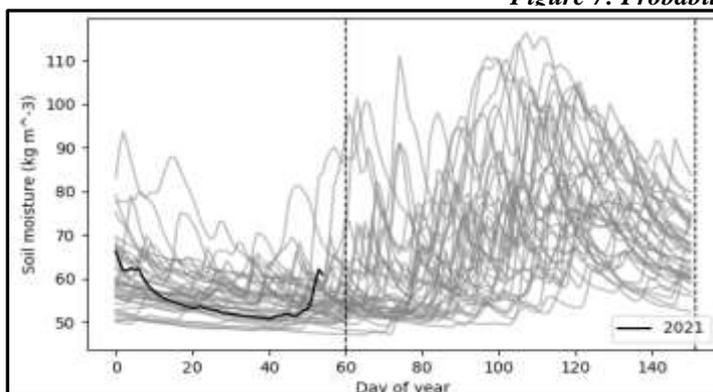


Figure 8: TAMSAT-ALERT soil moisture for Marsabit County

to failure of the long rains and expected high evapotranspiration rate. Continued drier than usual conditions will worsen the soil moisture quotient across the County in the month of July. Therefore, there is high probability that soil moisture will be in the

lower tercile category attributable to increased tendency of below normal soil moisture quotient in the forecasted period.

- Figure 8 shows TAMSAT-ALERT soil moisture time series for Marsabit County. The grey lines show the progression of soil moisture throughout historic years (1983-2019). The black lines show the progression of soil moisture in 2021. The dashed vertical lines show the start (1st March) and end (31st May) of the rainy season. Soil moisture declined in January but improved in the months of February and March. However, depressed rains received led to a declining trend of soil moisture in the months of April and June.

2.1.2 Pasture

- Pasture condition is good-fair in the pastoral livelihood zone of North Horr, Laisamis (Elem, Ngurnit, Ririma, parts of Kargi ward and Mt. Kulal area and Eastern parts of Loiyangalani) and agro-pastoral areas of Saku Sub-County. Most parts of Moyale Sub-County exhibited good pasture prompted by above normal seasonal cumulative rainfall amounts. Despite failure of the long rains in Saku Sub-County, pasture condition was good-fair due to the spill over effect of the near average performance of the previous season.
- However, in some localized parts of Laisamis Sub-County (Illaut, Farakoren, Sarima, Sori-Adhi, Korr and Gudas) and North Horr Sub-County (Marime, El-hadi, localized parts of North Horr, Maikona wards and Turbi/Bubisa wards), pasture condition was poor.
- When compared to similar periods, pasture condition is below normal in the pastoral livelihood zone of North Horr and Laisamis Sub-Counties and agro-pastoral areas of Saku Sub-County attributed to late onset and failure of the long rains season. Conversely, pasture condition in Moyale Sub-County was above normal.
- Insecurity along the border of Ellebor, Elledimtu in Moyale Sub-County, North Horr Sub-County (Bulluk, Sibilo, Forolle, and Balesaru) and parts of Saku Sub-County (Badassa, Gof chop, Dololo Dokatu, Jaldesa and Kubiqallo) hindered access of pasture.
- With expected progression of the long dry spell, available pasture is expected to last two months in the pastoral zone of Laisamis and North Horr Sub-Counties while 3 months in the agro-pastoral areas of Moyale and Saku Sub-Counties.

2.1.3 Browse

- Browse condition is fair in the pastoral livelihood zone while good-fair in the agro-pastoral livelihood zone.
- Available browse will last 2 and half months when compared to the normal of 4 months across the livelihood zones with exception of Moyale Sub-County where browse will coincide with the onset of the next rainy season.
- Variations in pasture and browse conditions across the livelihood zones was mainly occasioned by poor spatial distribution of the long rains and livestock migration in the month under review. Notable emergence of non-palatable vegetation was witnessed in some parts of North Horr, Laisamis, Saku and Moyale Sub-Counties. Quality and quantity of browse is fair in all the livelihood zones.

2.2 WATER RESOURCE

2.2.1 Sources

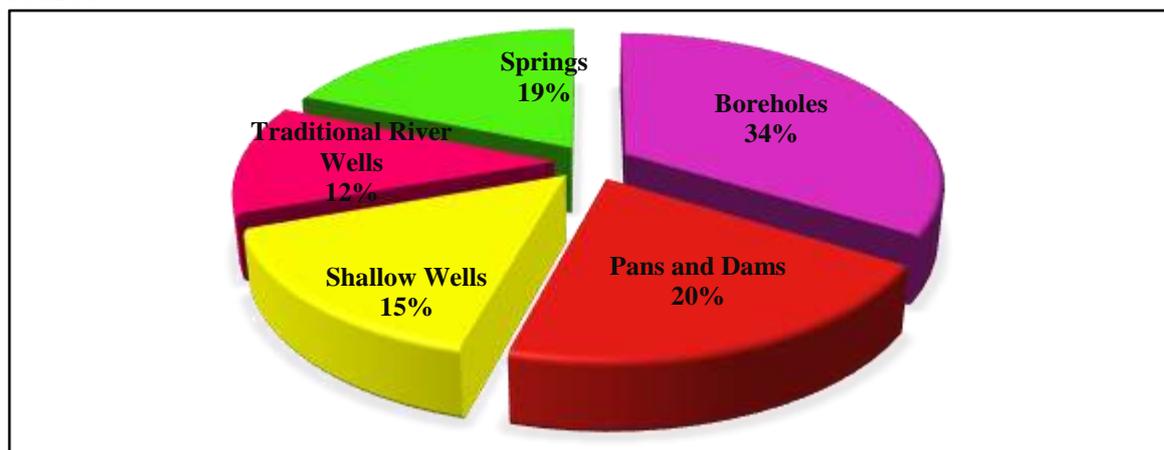


Figure 9: Main sources of water across the livelihood zones

- From figure 9 shown above, borehole was the main water source applied by most of the communities in all the livelihood zones as illustrated by a response rate of 34 percent.
- When compared to similar periods, water pans are usually the main sources of water at this particular time of the year. Other water sources adopted by the communities in the month under review are water pans, springs and traditional river wells at 20 percent, 19 percent, 15 percent and 12 percent respectively.
- A paltry 25-30 percent of all surface water sources are recharged in North Horr and Laisamis Sub-Counties while 50-60 percent of sub-surface water sources are recharged in Moyale Sub-County.
- With the progression of the long dry spell and expected increased livestock migration, recharge levels of sub-surface water sources are likely to reduce across the livelihood zone.

Table 1.0: Areas with acute water shortage that require water trucking

Sub-County	Areas where water trucking is required	Broken down boreholes
Saku	<ul style="list-style-type: none"> • Sagante, Dololo Dokatu, Qachacha, Karare, Jaldesa 	<ul style="list-style-type: none"> • N/A
North Horr	<ul style="list-style-type: none"> • Kalesa Manyatta, Lag Wachu, Burarat, Hurri Hills, Kubi Qoti, Yaa Garra, Qonchora Kushuna, Yaa Sharbana, Yaa Algana, Konon Gos, Yaa Odola, Yaa Galbo, Mude/Demo, Oronderi, Shankera, Toricha, Borri Manyatta, Qatamur, Kubi Adhi, Arilo Manyatta, Kob Dertu, Olom 	<ul style="list-style-type: none"> • Forolle (51 draw pipes 2” diameter 51 crane sockets) • Marime (47 draw pipes 1 1/2” diameter and 47 crane sockets)
Laisamis	<ul style="list-style-type: none"> • Ulauli, Laisamis Sec. School, Intiliya Manyatta, Silapani Pry. School, TTI, Laisamis Referral Hospital, Ndikir, Weltei, Sakardala, Bagasi, Kambinye, Namarei Manyatta, Namarei Pry. School, Namarei Health Centre, Arge Community, Lmooti, Lependera, Farakoren Pry. School 	<ul style="list-style-type: none"> • Ndikir (51 draw pipes 2” diameter 51 crane sockets). • Nthurusi (4Kw submersible motor and 7.5Kw pump control panel) • Arge (4Kw submersible motor) • Gangeisa (2.2Kw submersible motor)

2.2.2 Household Water Access and Utilization

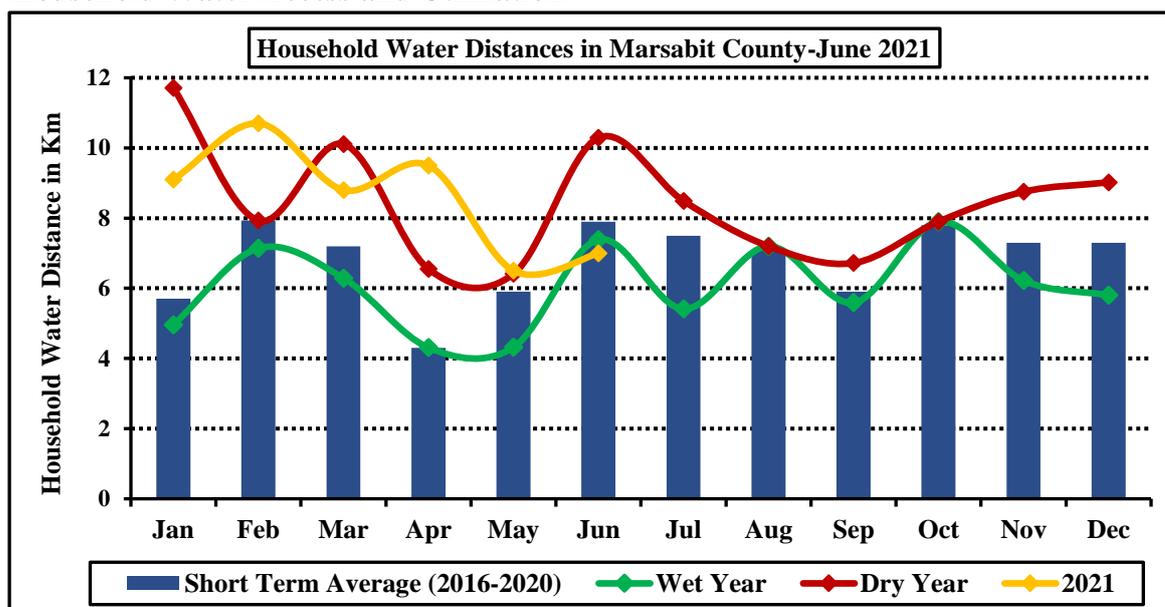


Figure 10: Current household return water distances compared to the Short Term Average distances (Km)

- From (Figure 10) shown above, return household water distances to the main water sources was 7.0km in the month under review which depicts an increase when compared to the previous month's household water distance of 6.5km in all the livelihood zones. The current household water distance of 7.0km is below the short term average household water distance of 7.9km by 11 percent.
- The current household water distances equate to water distances during a wet year and below the dry year water distances. Household waiting time at the water source across the livelihood zones increased due to reduced water recharge levels. Waiting time ranged between 45 and 60 minutes against the normal of 45 minutes in the agro-pastoral livelihood zone while fluctuated between 60 and 90 minutes against the normal of 60 minutes in the pastoral livelihood zone.
- Water consumption per household per day was 8 litres in agro-pastoral and 10 litres in pastoral livelihood zone compared to the normal 15-20 litres per person per day. The cost of water ranged between Ksh.2-5 in urban areas and Kshs.20/jerrican from water vendors.
- With expected drier than usual conditions, household water distances will increase thus likely further decline of water consumption at the household level.

2.2.3 Livestock Access

- From (Figure 11) shown below, return livestock trekking distance from grazing areas to water points is 15.9km in all the livelihood zones which illustrates an increase when compared to the previous month's grazing distance of 14.0km.
- The current livestock trekking distance is below normal by 12 percent when compared to the short term average livestock trekking distance of 18.1km. Wet year livestock trekking distances equates to current distances while dry year water distances are above the current water distances.
- In the agro-pastoral livelihood zone, livestock trekking distances ranged from 5-10km whereas in the pastoral areas of North Horr and Laisamis Sub-Counties, livestock trekking distances were 15-20km in the month under review. However, considerably longer trekking

distances above 25km were recorded in North Horr Sub-County (Mataburi, Yaa-Gara, Konon-Gos, Agargabo and Susuk) and Laisamis Sub-County (Civicon, Sarima, Moite, SoriAdhi, Hafare and Buuro).

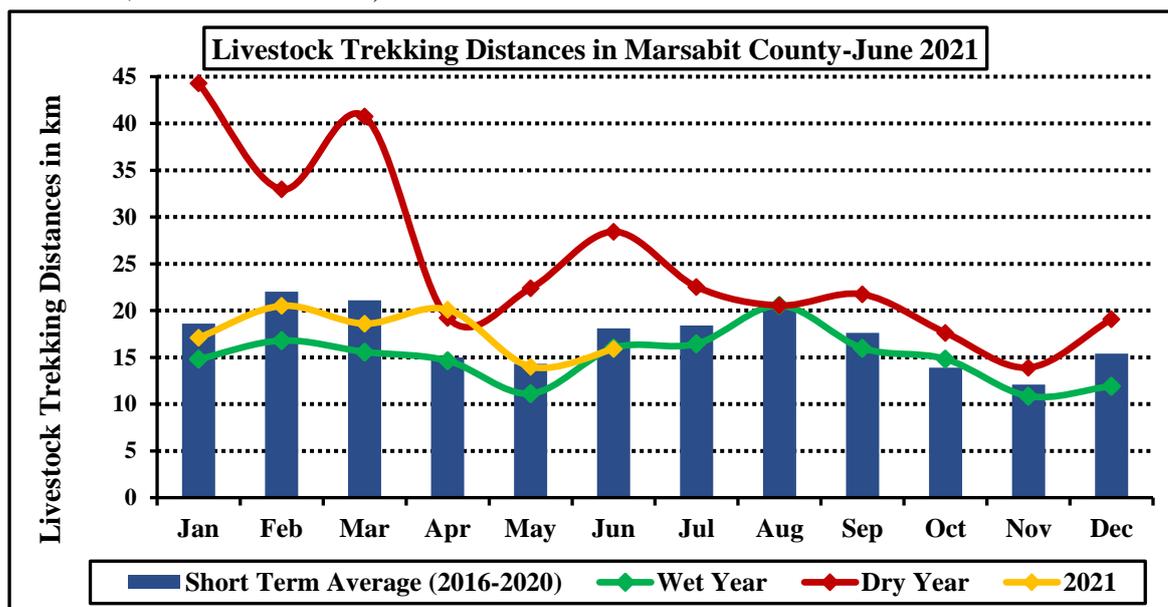


Figure 11: Current return livestock trekking distances compared to the Short Term Average distances (Km)

- Watering intervals for cattle is after one day and 2 days in the agro-pastoral and pastoral livelihood zones respectively compared to the normal watering interval of 1 day. Camels watering frequency is after 6 days in the agro-pastoral livelihood zone which is normal while in the pastoral livelihood zone, camels watering frequency is 7-10 days against the normal of 6-9 days. In the pastoral livelihood zone, small stock watering frequency is after 2-3 days while 1-2 days in the agro-pastoral livelihood zone compared to the normal of 2 days.
- As the long dry spell continues, watering frequencies are expected to decline for all the livestock species across the livelihood zones.

3.0 PRODUCTION INDICATORS

3.1 LIVESTOCK PRODUCTION

3.1.1 Livestock Body Condition

- Livestock body condition is good to fair for all species across the County with exception of some parts of Laisamis and North Horr Sub-counties, where small stocks exhibited fair body condition. However, livestock body condition was good in Moyale Sub-County due to good performance of the long rains.
- With expected persistence of drier than usual conditions coupled with failure of the long rains in North Horr and Laisamis Sub-Counties, forage deterioration and increased livestock trekking distances are anticipated hence likely deterioration of livestock body condition for all types.

3.1.2 Livestock Migration

- In the month under review, most of the livestock migrated to the dry season grazing areas due to failure of the long rains in North Horr and Laisamis Sub-counties.
- In North Horr Sub-County, livestock in Dukana ward are concentrated along river Balali, Konye, Balesaru, Diid Gola, Dosolle, Qarari, Garwole and Mata-lamana. In Maikona ward, livestock are concentrated around Warra, Hurri Hills, Aldero, Toricha and Burro.

- In North Horr ward, livestock have moved towards Konon-Gos, Dosole, Elbesso, Qorqa, Uranura, Kuro and Matho area.
- In Laisamis Sub County, livestock from Loiyangalani ward are concentrated in Komote, Pallo, Moite and Dakanti, Gatab, Civikon and Oltorot. Livestock in Sarima areas have also moved east of Loiyangalani due to insecurity. In Laisamis and Loglogo wards, livestock are generally around river Malgis, Kolboga, Lontolio, Merille and Nairibi while others have moved out to areas of Ririma in Kargi ward. Livestock in Korr-Ngurnit and Kargi wards are majorly around Ririma, Elem, Falam, Buuro, Yell, Irrir and Ngurnit.
- In Moyale Sub-County, livestock from Amballo and Walda have migrated to areas of Banale, Ellebor and Elledimtu.
- Livestock in the agro-pastoral areas of Saku Sub County are concentrated around Jaldesa and Kubiqallo areas. With expected progression of the long dry spell, livestock migration is likely to be more intense across the livelihood zones.

3.1.3 Tropical Livestock Units (TLU) and Calving & Kidding Rates

- In the agro-pastoral livelihood zone, poor income households had 2-4 tropical livestock units compared to 3-5 normally while the middle income had 6-10 compared to 10-15 normally. In the pastoral livelihood zone, poor income households had 3-5 tropical livestock units compared to 4-7 normally while the middle income had 8-14 compared to 15-20 normally.

3.1.4 Livestock Diseases and Mortalities

- During the month under review, the most common diseases incidences reported are ORF in camel calves and goat kids which occurred as an outbreak across the entire North Horr Sub-County. Sheep and goat pox was reported. Others include CCPP, Diarrhea, bloating linked to dietary change as result of improved pasture condition and PPR in goats and sheep.
- Trypanosomiasis and increased vector outbreak (Tsetse flies) population is observed which is an indicator of probable vector borne and protozoan diseases such as trypanosomiasis and tick borne diseases e.g anaplasmosis and heart water.

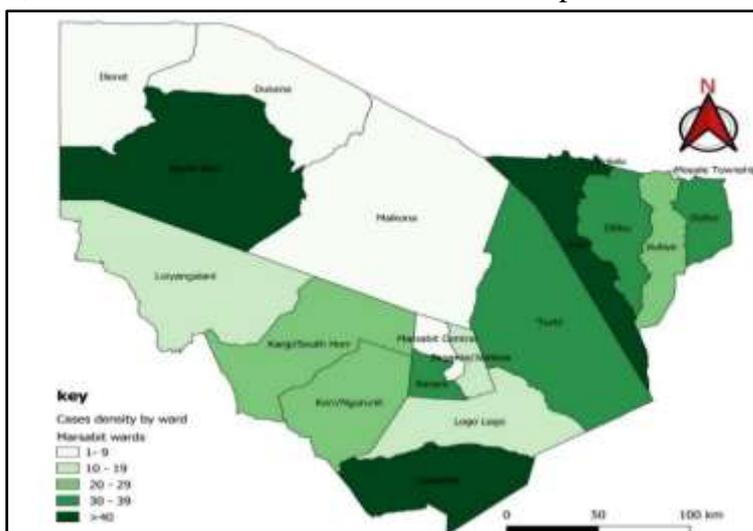


Figure 12: Geospatial Density of Cases by Ward

Table 2.0: Measure of Disease Severity by Livestock Species

Species	Morbidity (%)	Mortality (%)	Case fatality (%)
Camel	9.5	2.2	22.8
Cattle	7.1	1.4	19.1
Goats	11.0	2.0	18.3
Sheep	8.3	1.3	15.8
Shoats	8.6	1.2	14.1

3.1.5 Milk Production

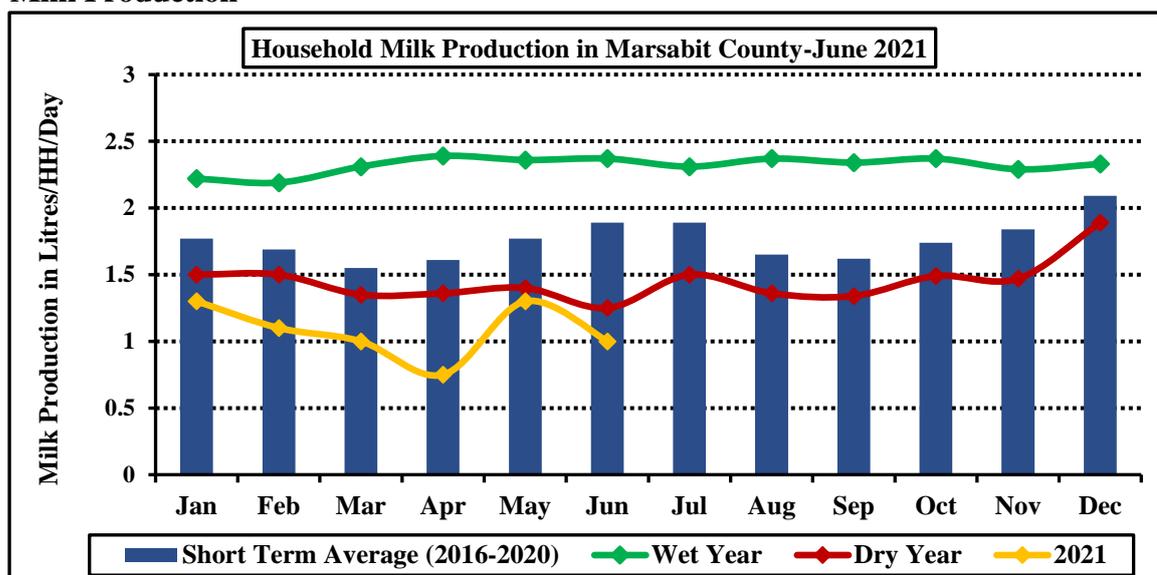


Figure 13: Milk production per household per day in litres across the livelihood zones

- From figure 13 shown above, household milk production per day for the month under review was 1.0 litres/household/day across the livelihood zones thus indicates a reduction when compared to the previous month's milk production of 1.3 litres/household/day.
- Current milk production of 1.0 litres is below the short term average milk production of 1.9 litres and also lower than milk production in wet and dry years.
- Below normal milk production was attributed to failure of the long rains and intense livestock migration to the dry season grazing areas. Milk production is expected to gradually decline in the next 2-3 months due to possibly continuation of the drier than usual conditions.
- Milk retailed at an average of Kshs.80-120 per litre across the livelihood zones compared to Kshs.75-90 normally which is 20-25 percent above normal.

3.1 RAIN-FED CROP PRODUCTION

3.2.1 Area Under Crop Cultivation

- Area under crop production include; Maize (850 acres), beans (550 acres), cowpeas (100 acres), green grams (120 acres), sorghum (220 acres) and 86 acres under horticultural production.

Crop Situation

CROP	STAGE	CONDITION
Maize	At physiological maturity where grain filling is complete.	The condition of the crop is good in Moyale Sub County. In Saku Sub county there is near total crop failure.
Cowpeas	At physiological maturity	The condition of the crop is good in Moyale Sub County. In Saku Sub county there is near total crop failure.
Beans	At physiological maturity	The condition of the crop is good in Moyale Sub County. In Saku Sub county there is near total crop failure.
Green grams	At physiological maturity	The condition of the crop is good in Moyale Sub County. In Saku Sub county there is near total crop failure.

- Failure of the long rains in the cropping areas of Saku Sub-county will likely lead to soil moisture deficits and near total crop failure. There were no major crop pests and diseases reported in the month under review.

4.0 MARKET PERFORMANCE

4.1 LIVESTOCK MARKETING

4.1.1 Cattle Prices

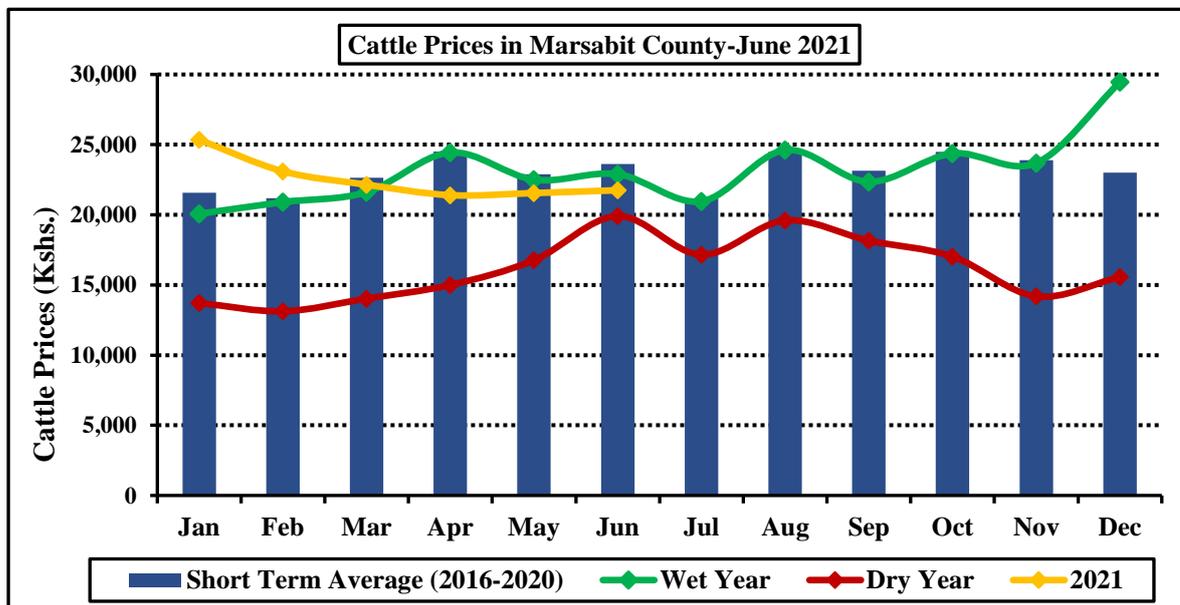


Figure 14: Cattle Prices Trends in Marsabit County

- From the figure (14) shown above, cattle price for the month under review was Kshs. 21,750 hence stable when compared to the preceding months' cattle price of Kshs. 21,550.
- When compared to similar periods, current cattle price of Kshs 21,750 almost equates to the wet years' prices while slightly below the normal year's prices by 8 percent.
- Slightly below normal cattle prices were occasioned by deteriorating cattle body condition majorly in the pastoral livelihood zone.
- With expected drier than usual conditions, cattle prices are likely to gradually decline in the next one month majorly in the pastoral livelihood zone of Laisamis and North Horr Sub-counties.

4.1.2 Goat Prices

- The current average goat price is Kshs. 3,550 thus slightly below normal by 8 percent when compared to the short term average price of Kshs. 3,845 as illustrated in figure 16 below.
- Slightly below goat prices were attributed to good-fair goat body condition in most parts of the County which is on a deteriorating trend. The current goat prices are below the wet year's goat prices. Disruptions of the supply chains mainly from the feeder markets to the terminal markets was occasioned by livestock migration and insecurity in North Horr, Laisamis and Saku Sub-Counties.
- Moyale livestock market recorded favourable prices of Kshs. 4,500-5,000. The traded livestock market volumes improved attributable to improved demand from the neighbouring Ethiopia market.

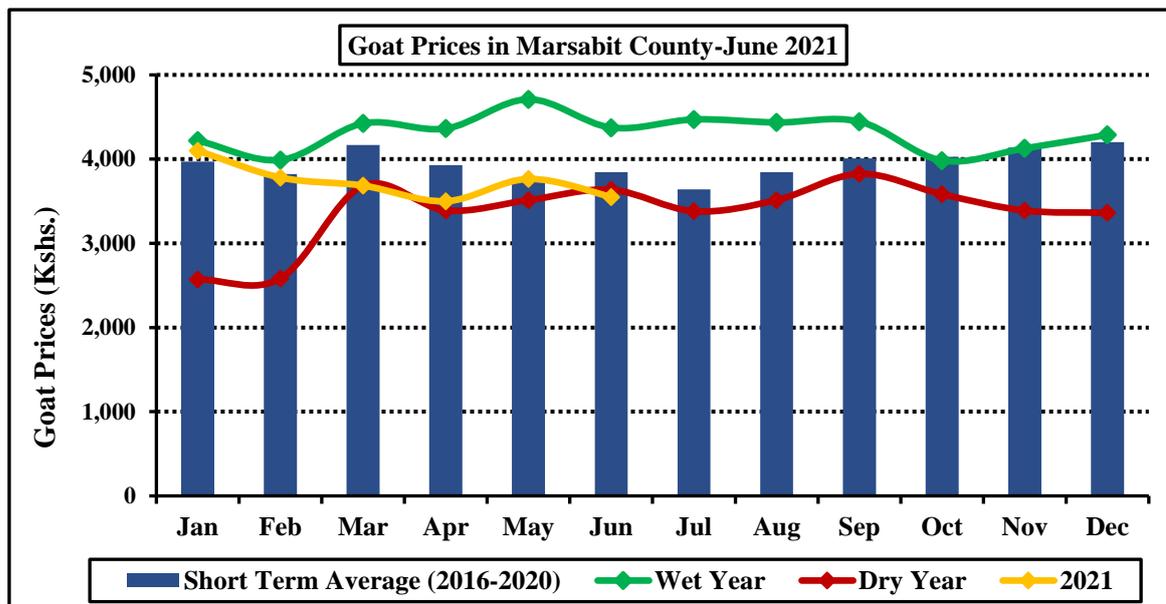


Figure 15: Goat Prices Trends in Marsabit County

- Approximately, 75 percent of the livestock markets were operational with exception of Forolle market in North Horr Sub-County that remained closed due to insecurity while Dabel and Sololo markets in Moyale Sub-County are not functional due to weakened demand and poor linkages with traders.
- Goat's prices are expected to gradually decline in the month of July due to progression of the long dry spell and weakened demand in the pastoral areas of North Horr and Laisamis Sub-Counties.

4.1.3 Sheep Prices

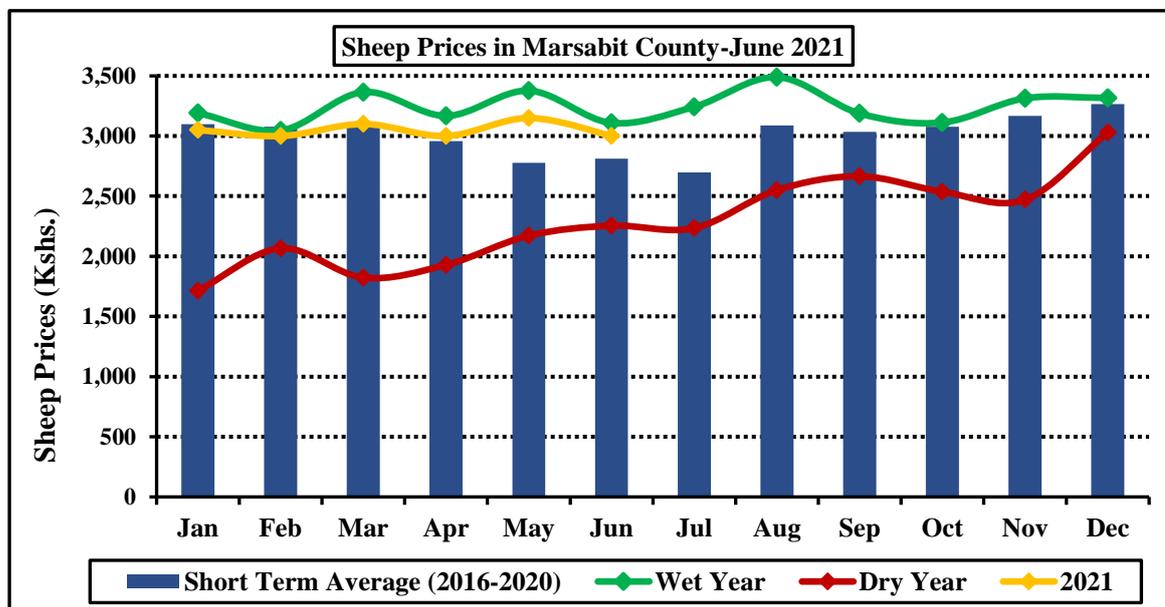


Figure 16: Sheep Prices Trends in Marsabit County

- From the figure 16 shown above, sheep price for the month under review was Kshs 3,000 thus gradually declined when compared to the previous month's sheep price of Kshs 3,150.
- When compared to the short-term average price, current sheep price is above normal and equates to the wet year average prices.

- Traded volumes for sheep was 40-45 daily hence a decline due to reduction in demand of sheep from the external markets.
- Varied inter-market trading margins between the major livestock and feeder markets underscore the need of improving market amalgamation especially in the pastoral livelihood zone.
- Sheep prices are expected to gradually decline in the next one month in the pastoral livelihood zone due to failure of the long rains and expected persistence of drier than usual conditions.

4.2 CROP PRICES

4.2.1 Maize

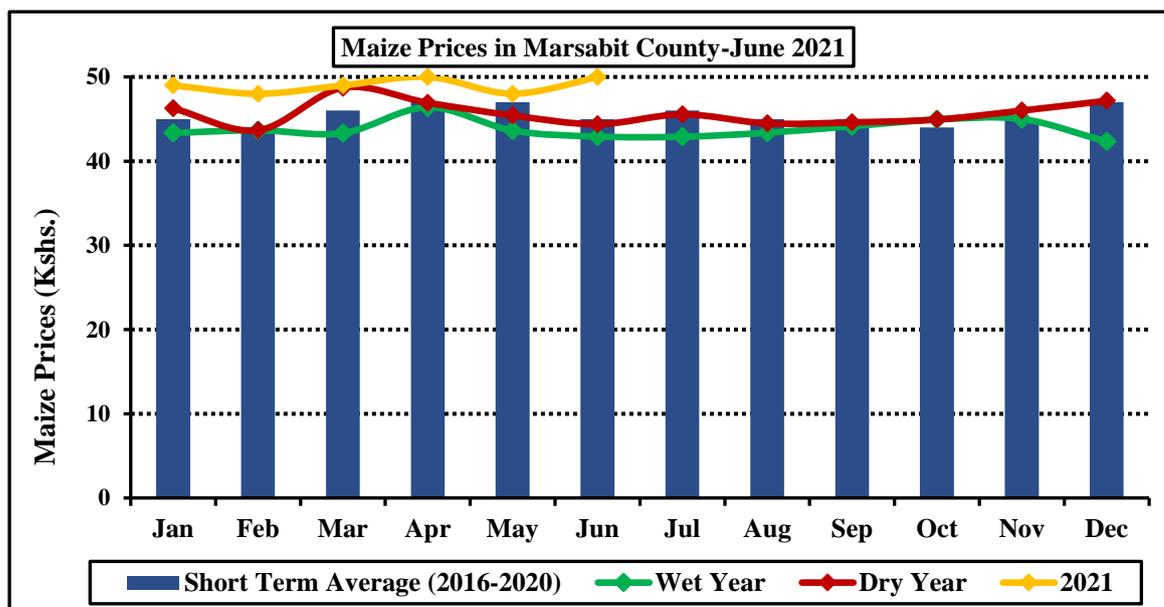


Figure 17: Maize Prices Trends in Marsabit County

- The current average maize price is Kshs. 50/kg, which is above normal when compared to the short-term average price of Kshs. 45/kg as illustrated in figure 17 above possibly due to the increased inflation rates. However, Moyale Sub-County posted favourable prices averaging at Kshs.30/kg attributed to improved cross border supplies from Ethiopia.
- Similarly, Saku Sub-County posted stable maize price at Ksh.40/kg occasioned by injections from the external commodity markets of Meru and Nyahururu. However, majority of the commodity markets in North Horr and Laisamis Sub-County recorded high maize prices of Kshs.55-60/kg denoting 25 percent above the short term average mainly prompted by abysmal market amalgamation.
- Notable high maize prices were recorded along the stretch of Lake Turkana with prices averaging at Kshs. 80/kg due to inaccessibility as the local settlements have been cut off from the main commodity markets.
- Weakened demand and abysmal market systems in the pastoral areas will likely disrupt injections in the local commodity markets hence expected gradual increase in maize prices.

4.2.2 Beans

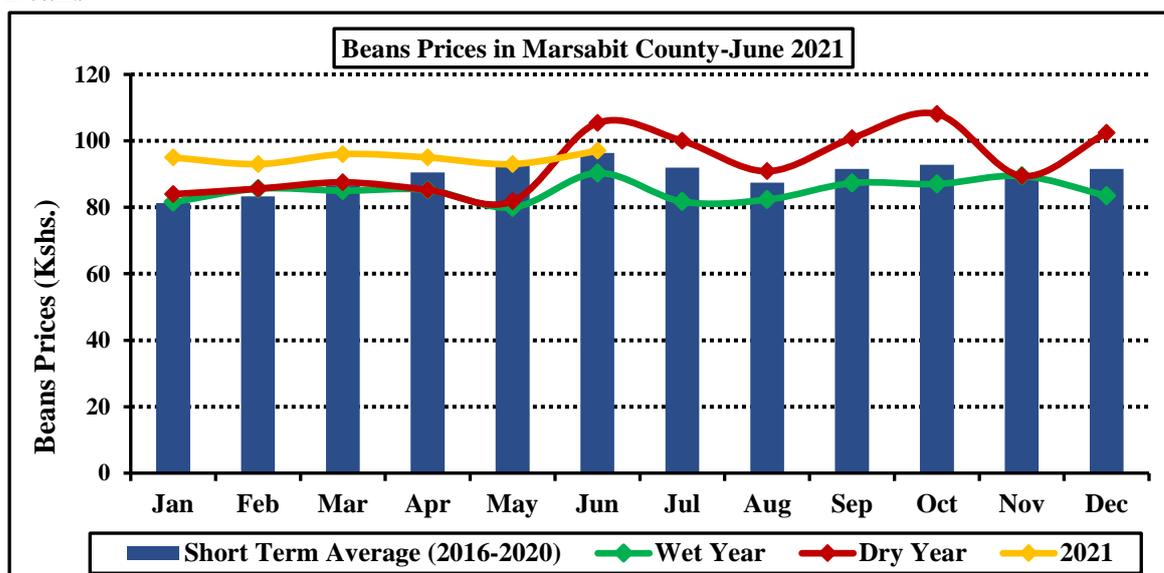


Figure 18: Beans Prices Trends in Marsabit County

- From the figure 18 shown above, beans prices retained at Kshs 97/kg in the month under review across the livelihood zones hence gradually increased when compared to the previous month's beans price of Kshs.93/kg. The current beans price of Kshs.97 equals to the short-term average and wet year beans prices.
- Moyale commodity market posted favourable beans prices averaging at Kshs 60-70/kg. Favourable beans prices in Moyale commodity market was attributed to improved supplies from the neighbouring Ethiopia market.
- However, Laisamis and North Horr Sub-counties posted high beans prices of Kshs 100-120/kg attributed to poor market integration and limited access with areas of Komote, Elmolo and Layeni in Laisamis Sub-County recording pricey beans averaging Kshs.145/kg.

4.2.3 Terms of Trade (TOT)

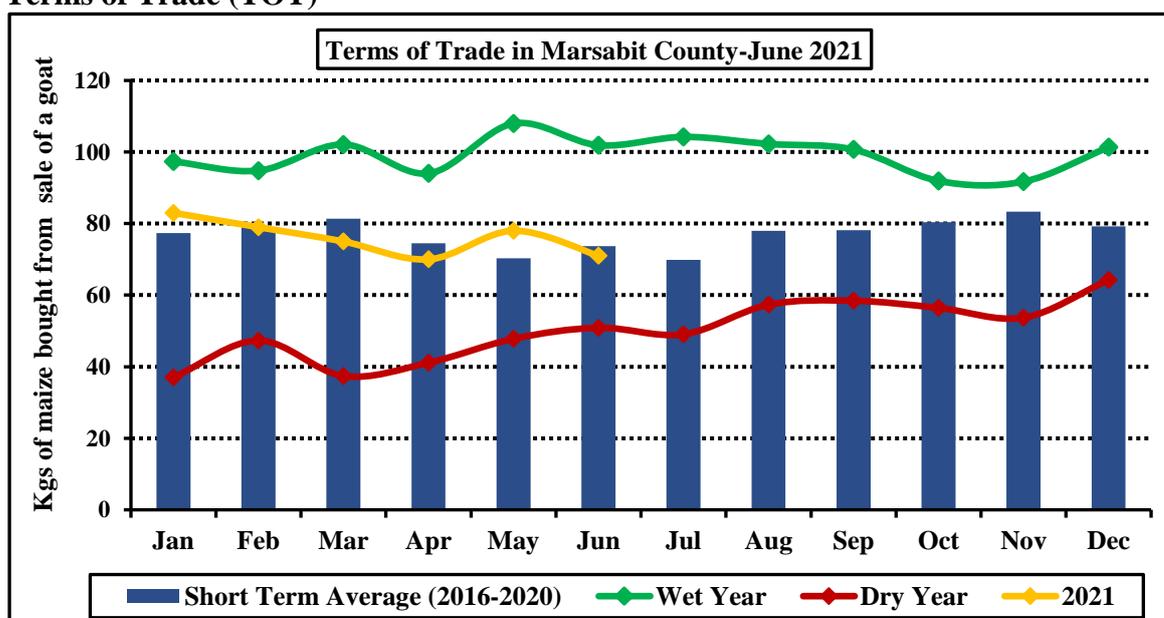


Figure 19: Current Terms of Trade versus Short Term Average

- The current terms of trade deteriorated from 78 in the previous month to 71 kilograms in exchange for the sale of a goat in the month under review. Deteriorating terms of trade was attributed to below normal goats' prices and increasing maize prices.
- However, Moyale Sub-County illustrated favourable terms of trade than other Sub-Counties attributed to vibrant Ethiopia market resulting to better goats' prices and lower maize prices. Terms of trade for Laisamis and North Horr Sub-Counties were considerably below the short term average mainly due to high maize prices and abysmal market systems.
- With expected gradual increase and reduction in maize and goats' prices respectively, terms of trade are likely to deteriorate further in the next one month.

5.0 FOOD CONSUMPTION AND NUTRITION STATUS

5.1 Milk Consumption

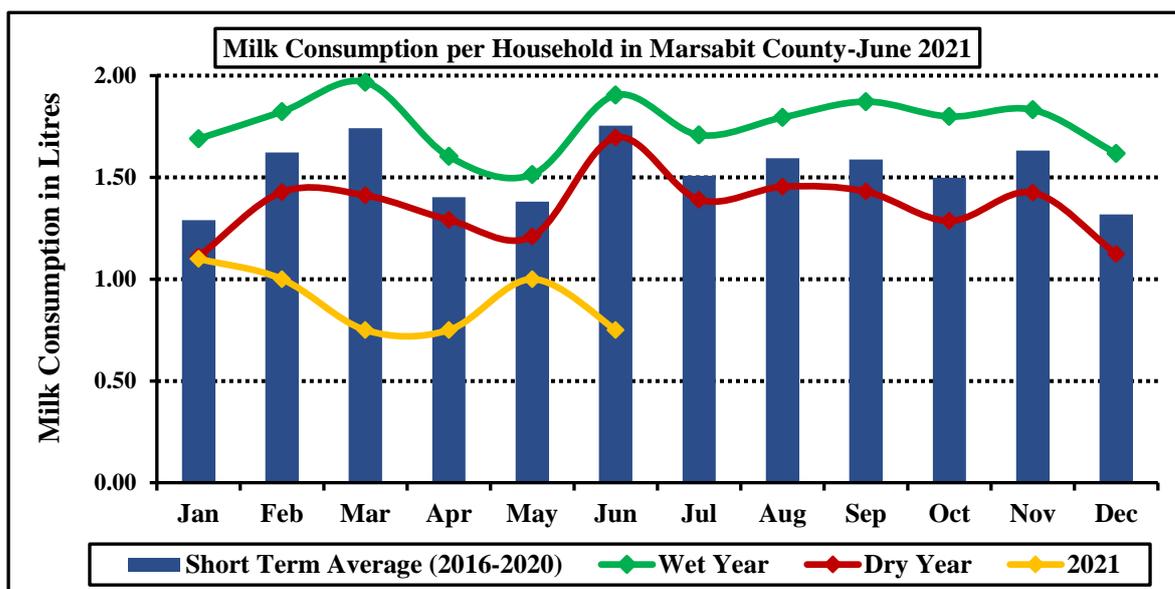


Figure 20: Milk consumption at household level in Litres

- From the figure 20 shown above, household milk consumption is 0.75 litres/household/day in the month under review across the livelihood zones thus a reduction when compared to the previous months' milk consumption of one litre/household/day.
- When compared to the short-term average milk consumption of 1.75litres/household/day, current milk consumption is significantly below normal attributed to below average milk production.
- Likewise, current milk consumption is below the dry and wet years' household milk consumption. With the progression of the long dry spell, milk consumption will likely reduce further in the next one month.

5.2 FOOD CONSUMPTION SCORE (FCS)

- The current food consumption score (FCS) across the County is 42.8 with 4.4 percent of households having poor food consumption while those with borderline and acceptable consumption were 41.9 percent and 53.7 percent respectively in all livelihood zones. In comparison to the previous month, slight deterioration in the food consumption categories but remained in the acceptable band category.

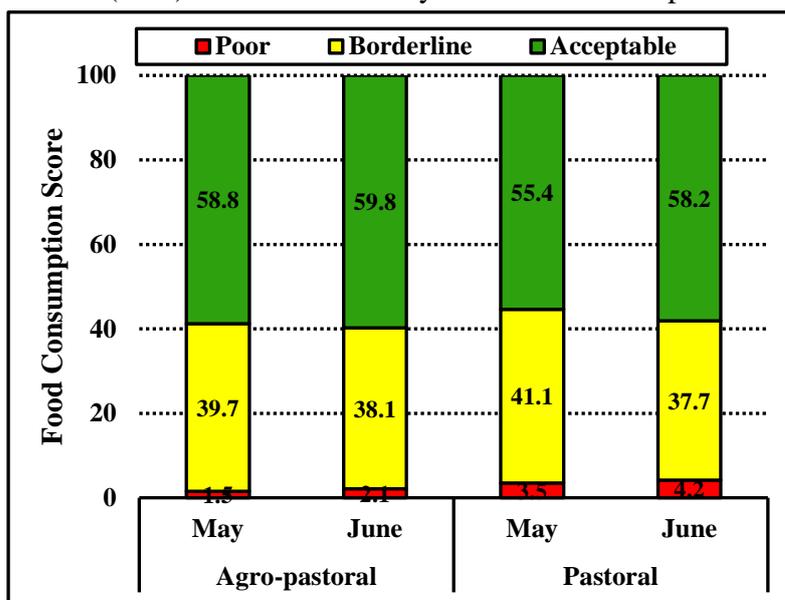


Figure 21: Food Consumption Trends in Marsabit

- In the agro-pastoral livelihood zone, proportion of households that had poor food consumption score was 2.1 percent while those with borderline and acceptable food consumption scores were 38.1 percent and 59.8 percent respectively. Equally, proportion of households in the pastoral livelihood zone that had poor, borderline and acceptable food consumption scores were 4.2 percent, 37.3 percent and 58.2 percent respectively. Generally, with expected progression of the long dry spell, food consumption score is expected to deteriorate to the borderline food consumption band in the next one month across the livelihood zones.

Table 3.0: Food Consumption Score by Wards

	FCS Mean	Poor FCS	Borderline FCS	Acceptable FCS
County	42.8	4.40%	41.90%	53.70%
Golbo	38.6	2.50%	41.80%	55.70%
Karare	40.3	0.50%	43.00%	56.50%
Korr	30.5	4.10%	70.50%	25.40%
Loiyangalani	30.1	11.50%	58.00%	30.50%
Laisamis	41.3	4.50%	36.50%	59.00%
Turbi	33.5	6.20%	33.30%	60.50%
North Horr	40.8	4.50%	35.40%	60.10%
Dukana	38.5	5.60%	65.90%	28.50%
Sagante	33.5	7.50%	58.10%	34.40%
Uran	48.5	0.50%	11.50%	88.00%
Kinisa	45.3	1.00%	7.50%	91.50%

- From the table shown above, 4.4 percent of households consumed staples and vegetables every day and never or very rarely are consuming protein rich food such as meat and dairy. Nearly 41.9 percent of the households consumed staples and vegetables every day, accompanied by oil and pulses a few times a week while 53.7 percent consumed staples and vegetables every day, regularly accompanied by oil and pulses and occasionally meat or dairy product.

- Most of the wards fell in the acceptable food consumption band with exception of Loiyangalani, Sagante, Korr and Turbi wards that were in the borderline food consumption bands.

5.3 HEALTH AND NUTRITION STATUS

5.3.1 Nutrition Status

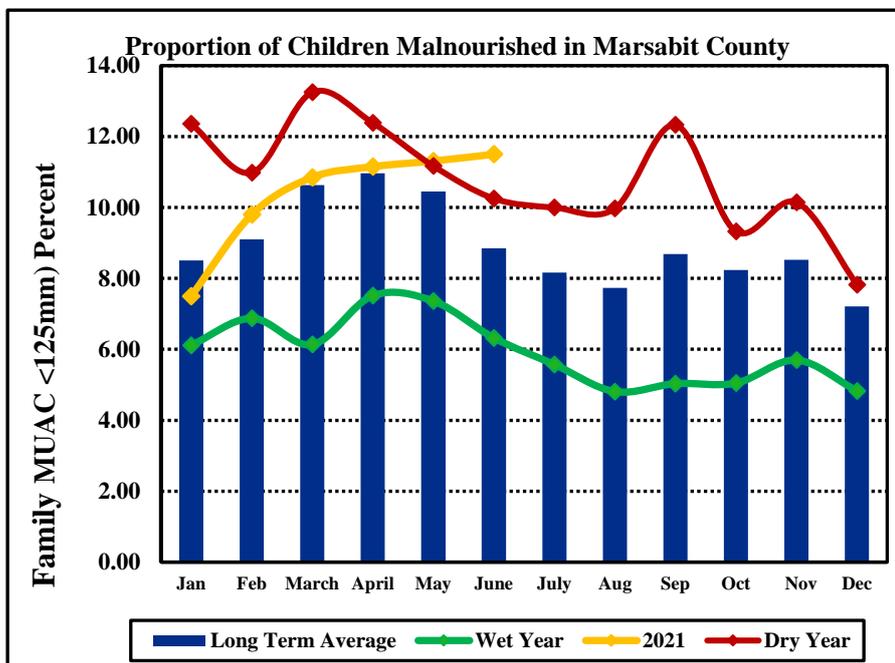


Figure 22: Proportion of Children < 5 Years Malnourished in Marsabit County

- Figure 22 illustrates MUAC of 11.5 percent of children who are moderately and severely malnourished which is above the long term average MUAC of 8.85 percent and remarkably above the wet year MUAC of 6.2 percent. Proportion of children who are severely malnourished are higher than those in the wet and normal

years while children who are moderately malnourished are more than those in dry years.

- Admissions in SFP program were high in the period between March and June compared to

the same period last year. The overall admission trends for both SAM & MAM are higher in 2021 compared to 2020 between the periods January-May which is closely comparable to a dry year of 2017.

- SAM Trends: Slight decrease in admissions compared to April 2021. MAM Trends:

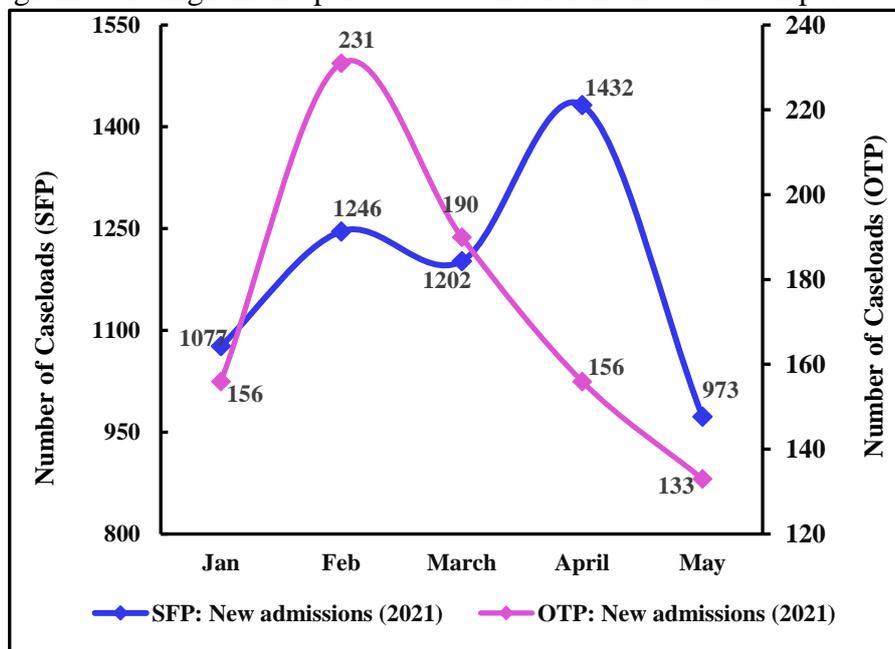


Figure 23: IMAM Program New Admission Trends in Marsabit County

Significant decline in May compared to April 2021.

5.4 COPING STRATEGIES

- From the (Figure 24) shown, the current reduced consumption based coping strategy index

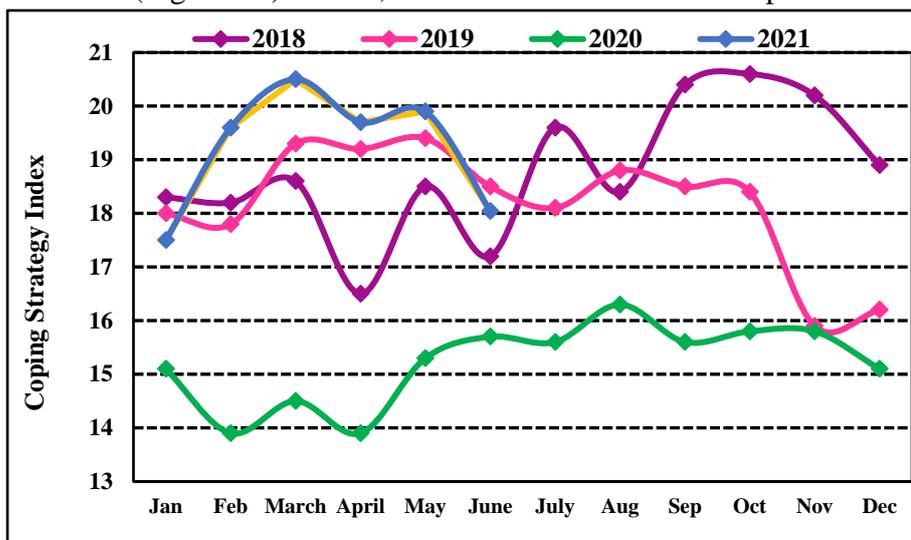


Figure 24: Coping Strategy Trends across the County

and June with rCSI of 19.6, 20.5, 19.7, 19.9 and 18.04 respectively. Generally, households applied frequent and severe strategies to cope with food gaps at the household level.

Table 5.0: Consumption Based Coping Strategy Index by Wards

Consumption based coping strategy index(rCSI)		
Sub-county	Ward	rCSI
Saku	Sagante	19.8
Saku	Karare	9.77
Laisamis	Korr	16.9
Laisamis	Loiyangalani	31.5
North Horr	North Horr	33.7
North Horr	Turbi	25.2
North Horr	Dukana	15.8
Moyale	Uran	11.7
Moyale	Golbo	15.6
Moyale	Heillu Manyatta	7.04

- From table shown above, households in North Horr, Loiyangalani, Merille, Turbi and Sagante applied crisis reduced consumption based coping strategies whereas those in Dukana, Karare, Uran, Korr, Golbo and Heillu Manyatta wards employed stressed consumption based coping strategies.
- Generally, 1.5 percent, 48.0 percent and 50.5 percent of the households applied reduced consumption based coping strategies that were minimal, stressed and crisis respectively.
- Notable reduced consumption based coping strategies employed by the households were reduction in frequency of food consumption, reduced portion size of meals and reliance on less preferred food in all the livelihood zones.

6.0 CURRENT INTERVENTION MEASURES

6.1 Food Aid

- Nawiri Child Development Programme (ChildFund Kenya) distributed food rations to 130 households in Karare ward (each household receiving 12kgs of rice, 10kgs of beans, 2 litres of fortified cooking oil and 1kg of salt). Also, distributed food rations to 150 households in Maikona ward (each household receiving 25kgs of maize, 10kgs of beans and 2 litres of fortified cooking oil).

6.2 Non Food Aid

- WFP is supporting farmers under Sustainable Food Systems Programme (SFSP) on activities geared towards promotion of nutrition and resilience building to the benefiting households under the SFSP programme. There is promotion of vegetables production through kitchen gardening, 34,000 orange Fleshed Sweet Potatoes vines have been supplied and are being bulked in 12 demonstration sites and multiplication of High Iron Rich fortified beans.
- CCM supported One Health mobile clinics (12 days a month of integrated animal, human and environmental health service provision in El Hadi, North Horr and Balesa catchment area. Supported creation of a Zoonotic Disease Unit (ZDU) in Marsabit County involving key County and Sub-County stakeholders. One Health Sensitization activities in 9 primary schools in North Horr Sub-County.
- Kenya Red Cross Society supported Covid-19 sensitization of health workers, community leaders, pregnant and lactating women. Sensitization of community members on Covid-19 in Saku, Moyale and Laisamis Sub-Counties.
- Welthungerhilfe supported rehabilitation of 6 boreholes in Laisamis (Laga Feregi, Ulauli, Laisamis borehole-2) and Moyale (Odda) and Turbi (Dosawachu, Burgabo) Sub-Counties with a cost of Kshs. 4,822,876.36 as part of covid-19 recovery initiative.
- Islamic Relief Kenya supported capacity building of 90 farmers drawn from 35 different farmers groups on dryland agriculture and post-harvest losses for cereals, legumes, fruits, and vegetables. Facilitating an exposure visit for 43 farmers from 35 different farmers' groups from Dabel location to Isiolo County to train them through observation, learning and sharing of experience with groups from similar environmental context with the objective of learning and inspiring them through experience gained from various expert and live model farmers.
- Islamic Relief Kenya commenced laying out of a 7.5 Hectares of Drip Irrigation at Ireswato Earth Dam in Dabel. Harvesting of 1,700 bales of fodder for storage in the hay store at the dam for use to feed livestock during the dry season.
- Islamic Relief Kenya rehabilitated three shallow wells (Dido, Roqa and Qawa). Constructing Ireswato Earth Dam with a capacity of 200,000 M³ (cubic meters) with solar water pumping system installed, elevated water tank, animal water troughs and water kiosk. Construction of a hay store 16M*8.2M*6M for fodder storage at Ireswato Earth Dam.
- CRS supported Mt. Marsabit Cooperative in the commercialization of milk, value chain is ongoing. Provided technical assistance on product development and business planning to the SME. Capacity assessment for the SME and other consultative engagements with relevant county government ongoing.
- CRS supported SCHMTs for Laisamis and North Horr to conduct on Job mentorship and IMAM surge monitoring and support mentorship to IMAM surge pilot facilities and 5

facilities in North Horr (Hurri hills, Dukana, Elhadi, Balesa and Elgade) and 3 facilities in Laisamis (Kurungu, Elmolo Bay and Loiyangalani) have been covered.

- P & G distributed PUR and conducted hygiene promotion at household Level, reaching 929 males and 962 females in Karare, Sololo Makutano, Funan Idha, Elle Bor and Elle Dimtu.
- Kenya RAPID (In Partnership with County Government and SBC) constructed 1 steel tank of 50,000 litre capacity in Bubisa in partnership with MWA/County Government.
- Global Funds in partnership with Kenya Red Cross supported monthly Home and community based care by CHVs to PLHIVs--75 CHVs visited 1505 PLHIVs. Men2men sensitizations on SGBV, HIV and COVID-19 awareness in the community--reached 253 men and 55 females. Conducted 3 county and Sub-County advocacy and data review forums engaging 45 partners and stakeholders.
- Child Sponsorship (CSP)-FH Private Funds supported SHGS in Karare, Jaldesa, Kargi, North Horr and Kalacha. CLTS triggering was done in Minchominyi and Lorora village where 103 HH and 43(30F, 13M) people were reached. Supported School Fees Payments for 60 students in Lowlands (North Horr and Laisamis Sub-County) and 304 students in Mountain Cluster (Saku Sub-County) to tune of Kshs. 2,788,000.
- ERIKS Children Projects in partnership with ERIKSJALPHEN handed over two completed School Administration Blocks -One for Manyatta Daaba Primary -Saku and one for Qicha Primary (Sololo). 200 Desks distributed to Schools; Manyatta Daaba Primary, Segel, Kubi Qallo and Jaldesa Primary. Water Trucking for Hekima Primary (20,000 Litres) to facilitates reopening. Two construction projects begun -Latrine in Segel, Daaba and Jaldesa Primary and a classroom in Kubi Qallo.
- Concern World Wide supported monthly dissemination of nutrition education in 6CUs. During the reporting month 65 CHVs delivered health education targeting 580 beneficiaries. Key messages delivered was on exclusive breastfeeding, complementary feeding at different ages, nutritional counselling, Household food security and milk utilization and essential hygiene at the household.
- Concern World Wide supported household visits by CHWs for nutrition screening, nutrition counselling/education and referral and hygiene promotion: Home visits by CHVs North Horr reached 4909 HH where 4766 (M; 2423 F; 2343) children screened. The CHVs under supervision of CHAs sensitized households on importance of immunization, critical moment of handwashing, defaulter tracing and ensuring referrals to health facilities for medical and nutrition support.
- Concern World Wide supported monthly review meetings in linked health facilities. A total of 24 CHAs (M;7 F;17) attended the meeting. Key agenda discussed during the meeting was data review on key performance indicators i.e. Reporting rates of all community units, Reproductive health, diarrhea, Vitamin A referrals and supplementation, immunization defaulters referred and ANC.
- Concern World Wide supported IMAM Surge and Emergency Response planning: Second cycle of outreaches in 13 sites in Illeret ward of North Horr Sub County reaching 593(M: 290 F: 303). Total new admissions for OTP were 7 (M: 4 F: 3) and SFP were 15(M: 9 F:6) children. OTP revisits 191(M:89 F:105) and SFP revisits 380(M:191 F:189). In Loiyangalani, 7 sites were visited where 434 (M 206, F 228) children screened and 18 children were admitted in SFP. The total number of revisits OTP revisits 32 (M:14 F:18) and SFP revisits 160(M:74 F:86). The SCHMT team in North Horr conducted routine monitoring on IMAM surge in eleven health facilities namely: -Bubisa, Burgabo, Turbi,

North Horr, Malabot, Kalacha, Maikona, Dukana, El-hadi, Shurr and Balesa. Twenty-four (F; 15 M; 9) health workers were engaged and mentored on IMAM surge. The IMAM surge and Vitamin A monitoring charts were updated though their documentation in all the facility registers remained as a challenge. Health facility meetings minutes were not available in Bubisa, Turbi and North Horr facilities. Additionally, no defaulter tracing mechanism was in place for the eleven facilities visited.

7.0 FOOD SECURITY PROGNOSIS

- Seasonal cumulative long rains received were significantly below the long-term cumulative rainfall amounts with a paltry 36percent of the normal long rains received. The depressed rains in March and April crowded out the enhanced rains received in May hence seasonal cumulative rainfall shortfalls recorded and equated to the 2019 long rains which was a typical abnormally dry season. By and large, the two consecutive rainy seasons have failed.
- The 3-months vegetation condition index stagnated in the moderate category as the cumulative rains received had negligible causal effect on forage invigoration. With expected persistence of the forecasted drier than usual conditions, the 3-months vegetation condition index will reduce and possibly shift to the severe vegetation deficit band in July.
- Forecasted soil moisture that indicates a likelihood deterioration across the County in the JAS dry season due to expected high evapotranspiration rates. Continued drier than usual conditions will worsen the soil moisture quotient across the County in the month of July.
- A paltry 25-30 percent of all surface water sources are recharged in North Horr and Laisamis Sub-Counties while 50-60 percent of sub-surface water sources are recharged in Moyale Sub-County. With the progression of the long dry spell and expected increased livestock migration, recharge levels of sub-surface water sources are likely to reduce across the livelihood zones coupled with frequent breakdowns of strategic boreholes.
- Milk production and consumption are below the long term average attributed to failure of the long rains in addition to mass livestock migration hence expected to follow similar trend for the next 2-3 months as the long dry spell persists.
- Failure of the long rains in the cropping areas of Saku Sub-county will likely lead to soil moisture deficits and near total crop failure while potential near average harvest expected in Moyale Sub-county due to enhanced seasonal rains.
- Terms of trade for Laisamis and North Horr Sub-Counties were considerably below the short term average mainly due to high maize prices and abysmal market systems. With expected gradual increase and reduction in maize and goats' prices respectively, terms of trade are likely to deteriorate further in the next one month.
- Food consumption score will likely shift to the acceptable band while households will continue to adopt crisis coping mechanisms to lessen the existing household food gaps.
- Admissions in SFP program were high in the period between March and June compared to the same period last year. The overall admission trends for both SAM & MAM are higher in 2021 compared to 2020 between the periods January-May which closely compares to a dry year of 2017. With persistence of the drier than usual conditions and consecutive failure of two consecutive rainy seasons, trends for both SFP and OTP new admissions likely to increase over time.

8.0 RECOMMENDATIONS

- Immediate food assistance to the most vulnerable populace in Marsabit County
- Provision of emergency health services, treatment of acute malnutrition, upscale access to life saving nutrition services IMAM and blanket supplementary feeding programme.
- Reprioritization of integrated outreach support based on community based surveillance finding to ensure all the hot spot areas are supported to enhance access to emergency nutrition services with continued surveillance through IMAM surge monitoring and support.
- Up-scaling of various safety nets programmes across the County.
- Water trucking to address the immediate water needs for both human and livestock in the water scarce areas.
- Procurement and stock piling of fast moving spare parts for strategic water sources. Repair of strategic boreholes, servicing of gensets and rehabilitation of grounded water bowzers
- Stock piling of vaccines, strategic vaccination and enhanced livestock disease surveillance.
- Linking herders with feed manufacturers and suppliers to increase access to livestock inputs.
- Activation of satellite livestock markets and commercial destocking to salvage pastoralists against imminent losses with expected progression of the long dry spell.
- The National Government, County Government and other implementing partners should lead and coordinate reconciliation efforts in North Horr and Saku sub-counties. In addition, develop and update negotiated and agreed land use and range management plans and continue research on current grazing patterns to prevent sporadic violence.