



**National Drought Management Authority
(NYERI) COUNTY
DROUGHT EARLY WARNING BULLETIN FOR JUNE 2020**

JUNE EWS PHASE



Drought Situation & EW Phase Classification

Biophysical Indicators

- Kieni received offseason rains during the month of June. Amounts received were above normal. Temporal and spatial distribution was poor. Kieni East Sub County with an exception of Gakawa ward did not record rains.
- Above normal vegetation condition continued to be recorded as a result of the offseason rains.
- Water availability and access in Kieni West was still good. However, in Kieni East the situation was fair. Water storage structures were still holding adequate amounts.

Socio Economic Indicators (Impact Indicators)

- Livestock body condition and health was impressive.
- Milk production was above the long-term average while consumption was within normal thresholds.
- Distances to water sources for households use increased compared to the previous month.
- Return distances from the grazing field to water sources increased compared to last month
- Terms of trade ratio remained similar to the previous month.
- The coping strategy index increased compared to the previous month.

Early Warning (EW) Phase Classification

Livelihood Zone	Phase	Trend
Mixed Farming	Normal	Deteriorating
Marginal Mixed Farming	Normal	Deteriorating
Biophysical Indicators	Value	Normal Range/Value
Rainfall (%)	122	90-110% of LTA
VCI	76.8	>35
Forage condition	Good-Fair	Fair
Production indicators	Value	Normal
Crop Condition (Maize, beans and potatoes)	Good	Good
Livestock Body Condition	Good	Good
Milk Production	7.7	6.2 litres
Access Indicators	Value	Normal
Terms of Trade (ToT)	112	89
Milk Consumption	1.6 litres	1.6 litres
Return distance to water sources for household use	0.9 Km	1.3 Km
Return distance to water sources from grazing field.	1.5 Km	2.1 Km
Utilization indicators	Value	Normal
Nutrition Status, MUAC (% at risk of malnutrition)	0.0	1.1
Coping Strategy Index	4.35	>5

- Short rains harvests
- Short dry spell
- Reduced milk yields
- Increased HH Food Stocks
- Land preparation

- Planting/Weeding
- Long rains
- High Calving Rate
- Milk Yields Increase

- Long rains harvests
- A long dry spell
- Land preparation
- Increased HH Food Stocks
- Kidding (Sept)

- Short rains
- Planting/weeding

Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sept	Oct	Nov	Dec
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1.0 CLIMATIC CONDITIONS

1.1 RAINFALL PERFORMANCE

- Offseason rains were received during the month of June.
- Amounts received in Kieni were above normal, averaging 122 percent of the normal rains for an average of four to five days. The bulk of the rains were recorded in the second and third dekad. The first dekad received below normal amounts.
- Temporal and spatial distribution was poor across the livelihood zones. Kieni East Sub County with an exception of Gakawa ward did not record rains during the month of under review.
- Generally, Nyeri County received 17.3 mm and 30.8 mm in the first and second dekad compared to the Long-Term Average of 20.8 and 17.2 respectively as shown in figure 1.

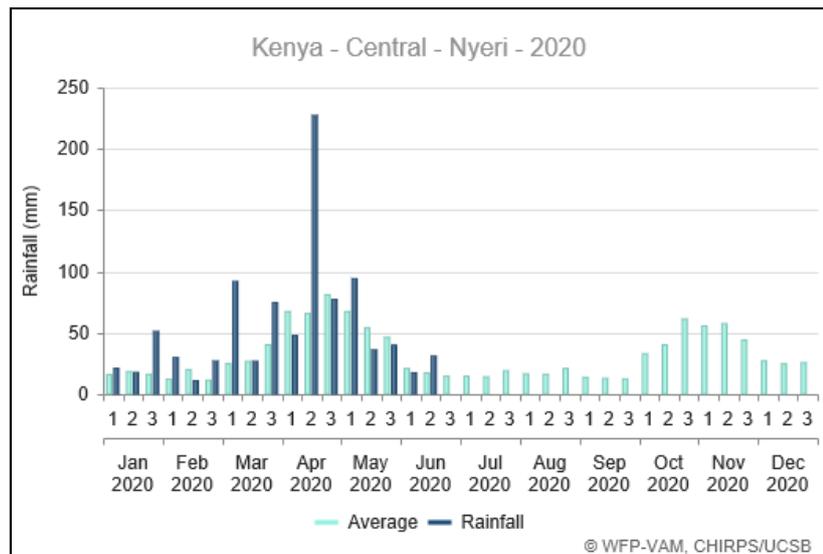


Figure 1: presentation of the rainfall performance for June

2.0 IMPACTS ON VEGETATION AND WATER

2.1 VEGETATION CONDITION

2.1.1 VEGETATION CONDITION INDEX(VCI)

- The offseason rains received in Kieni West and some pockets in Kieni East supported the already good vegetation condition. However, the vegetation condition in Kieni East deteriorated slightly due to lack of rains and frequent frost bites. The 3 monthly vegetation condition index is 76.8 indicative of above normal vegetation greenness as shown in figure 2 (a) below.

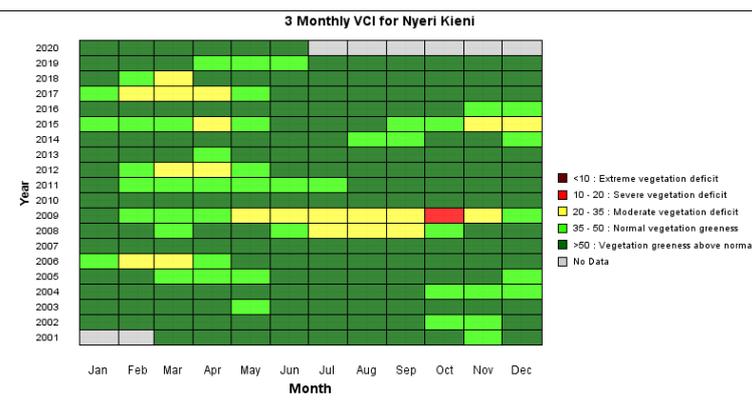


Figure 2 (a): Presentation of 3 monthly VCI for Kieni

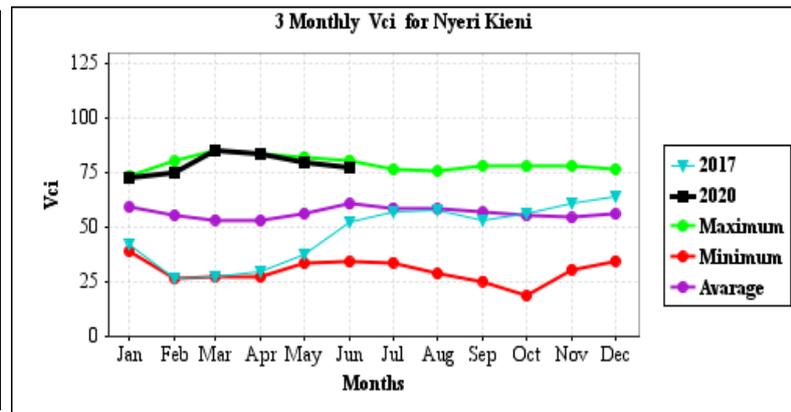


Figure 2 (b): Presentation of 3 monthly VCI for Kieni

2.1.2 Pasture

- Pasture condition remained good in marginal mixed farming livelihood zones due to the offseason rains that were received.
- However, in Kieni East Sub County pasture condition deteriorated during the month under review, attributed to lack of rains and frost bites.
- The quantity remained good across the livelihood zones. Harvesting of cultivated pastures and Napier grass was still ongoing.
- Available pastures are expected to last for the next four months in marginal mixed farming livelihood zones and three months in mixed farming livelihood zones.

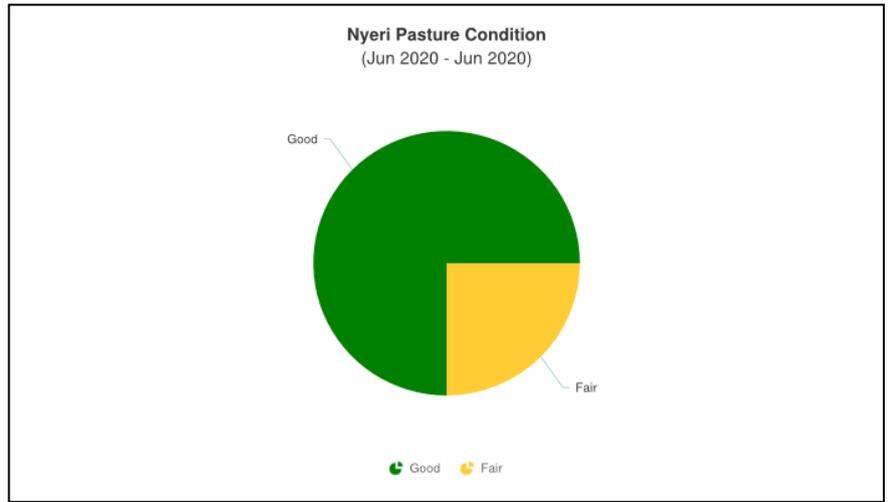


Figure 3(a): presentation of pasture condition for Nyeri (Kieni) County

2.1.3 Browse

- Browse condition remained good across the livelihood zones and was still above normal compared to a similar period, in the previous years.
- The available browse is expected to last for four months.

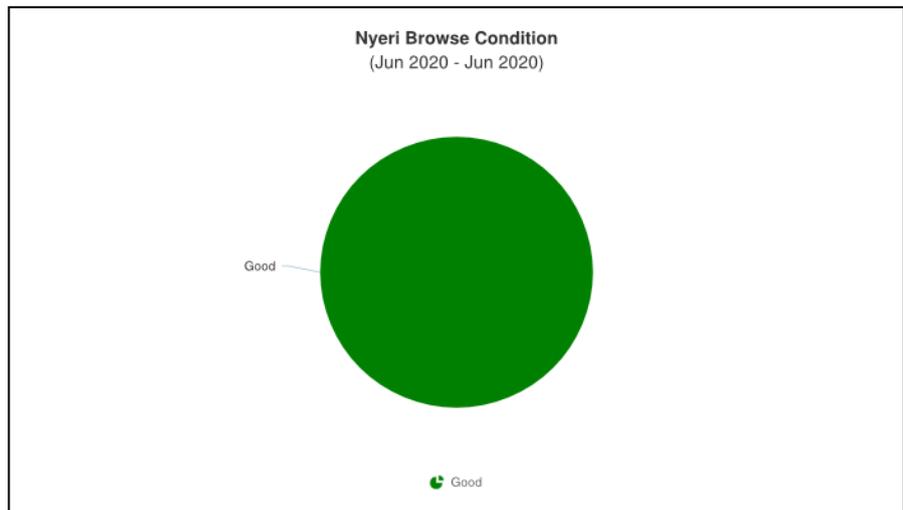


Figure 3(b): presentation of browse condition for Nyeri (Kieni) County

2.2 WATER RESOURCE

2.2.1 Sources

- The main sources of water for Kieni were rivers at 71 percent, pans and dams at 27 percent and springs at three percent as shown in figure 4.
- Water access was still stable in Kieni West, due to the offseason rains were received. However, in Kieni East access to water deteriorated due to lack of rains. Water rationing has started in Naromoru/Kiamathaga ward in Kieni East Sub County. Households were receiving piped water for two days weekly.
- Open water sources are still impounding water to full capacity in Kieni West while in Kieni East they were 70 percent full.

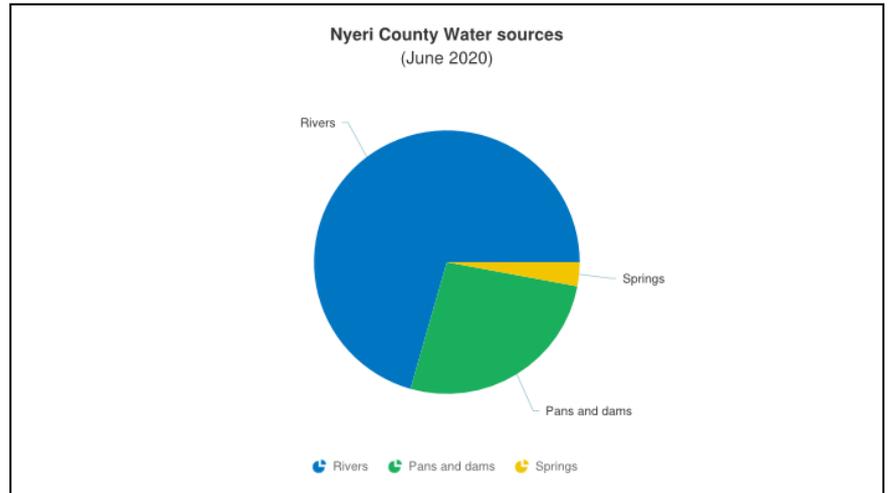


Figure 4: Shows main water sources for Kieni

2.2.2 Household access and Utilization

- Distance from the household to water sources increased from 0.2 Km in May to 0.9 Km in June.
- The increase in distances could be attributed to lack of rains mostly in Kieni East subcounty. Distances in Kieni West remained stable.
- The month's distances were lower by 30 percent compared to the 2015-2019 long term average of 1.3 Km as indicated in figure 5.

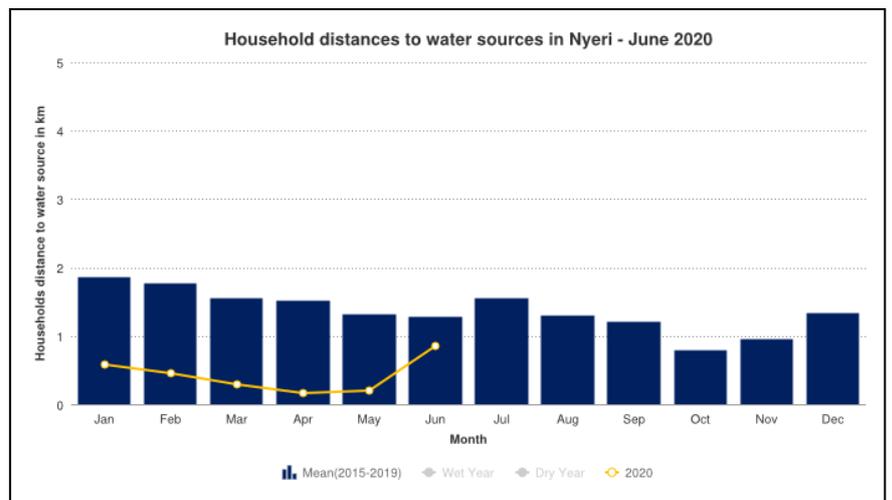


Figure 5: presentation of average return distances

2.2.3 Livestock access

- The average distances from the grazing fields to water sources increased by 200 percent from 0.5 Km in May to 1.5 Km in June.
- Registered distances were lower by 29 percent compared to the 2015-2019 long term average of 2.1 as shown in figure 6.

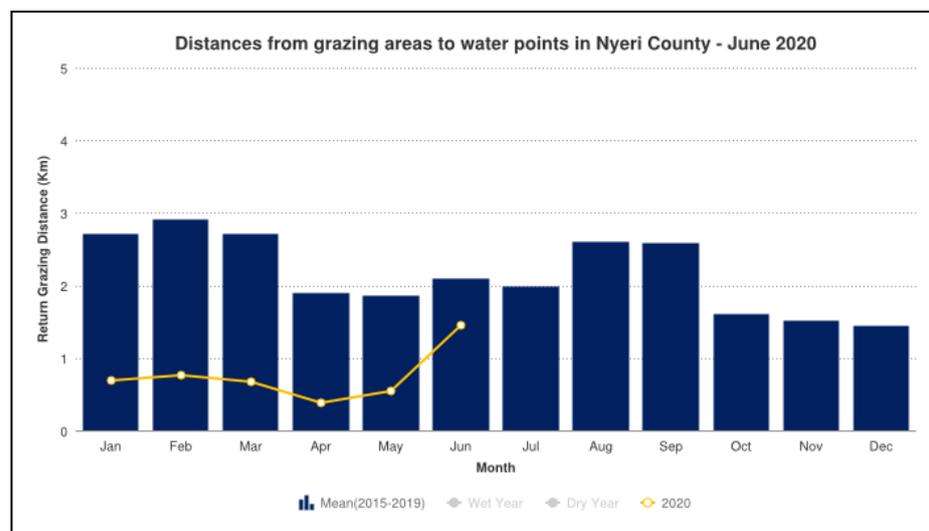


Figure 6: presentation of average grazing distances to water

3.0 PRODUCTION INDICATORS

3.1 LIVESTOCK PRODUCTION

3.1.1 Livestock Body Condition

- Body condition for all the three livestock species (Cattle, Sheep and goats) is good across the livelihood zones. This can be attributed to adequate pastures, browse and other feed resources like Napier and crop residue which were readily available.
- Body condition for all livestock species are likely to remain good for the next two months.

3.1.2 Livestock diseases

- No contagious livestock disease outbreaks were reported in the region during the month under review.

3.1.3 Milk Production

- The average milk production dropped by ten percent from 9.1 litres in May to 7.7 litres in June, attributed to increased distances to water and deteriorating pastures quality mostly in Kieni East.
- The month's production was higher by 24 percent as compared to the 2015-2019 LTA of 6.2 as shown in figure 8.

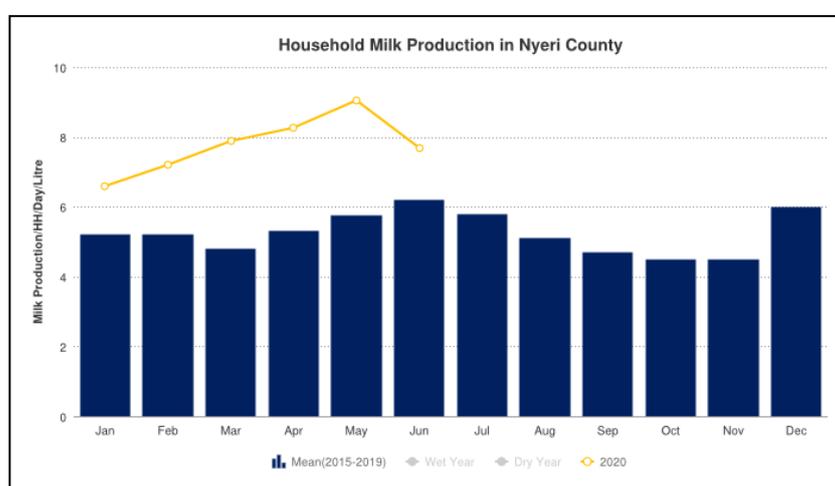


Figure 8: Presentation of average milk production for the region

3.2 RAIN-FED CROP PRODUCTION

3.2.1 Stage and Condition of food Crops.

- The main rain fed crops grown in Kieni East and Kieni West sub counties include: Maize, beans and potatoes. Crops at the farms were in good condition and at different stages of development, Maize was at grain filling, beans at ripening to pod formation stage and potatoes were at premature stage.
- Harvesting of beans while still green was ongoing.
- For late planters, maize was at tussling stage. Harvesting of potatoes under plantation Establishment Livelihood system (PELIS) was still ongoing.

4.0 MARKET PERFORMANCE

4.1 LIVESTOCK MARKETING

4.1.1 Cattle Price

- Livestock prices were still on an upward trend, attributed to good livestock body condition and health.
- A mature four-year-old bull retailed for Ksh 36,125 in June from Ksh 34,667 in May, four percent increase.
- Compared to the 2017-2019 short term averages of Ksh 22,833 reported prices were higher by 58 percent, as indicated in figure 9.

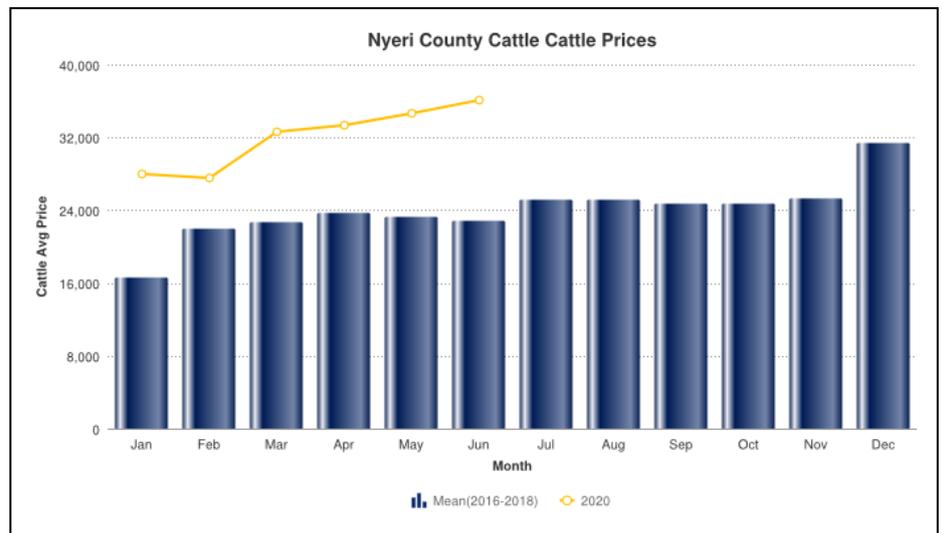


Figure 9: Outline average price trends for cattle

4.1.2 Sheep prices

- A two-year-old medium size Sheep sold for Ksh 4,750 same as was reported last month.
- The month's prices were higher by 27 percent, compared to the 2017-2019 short term averages of Ksh 3,733 as shown in figure 10.

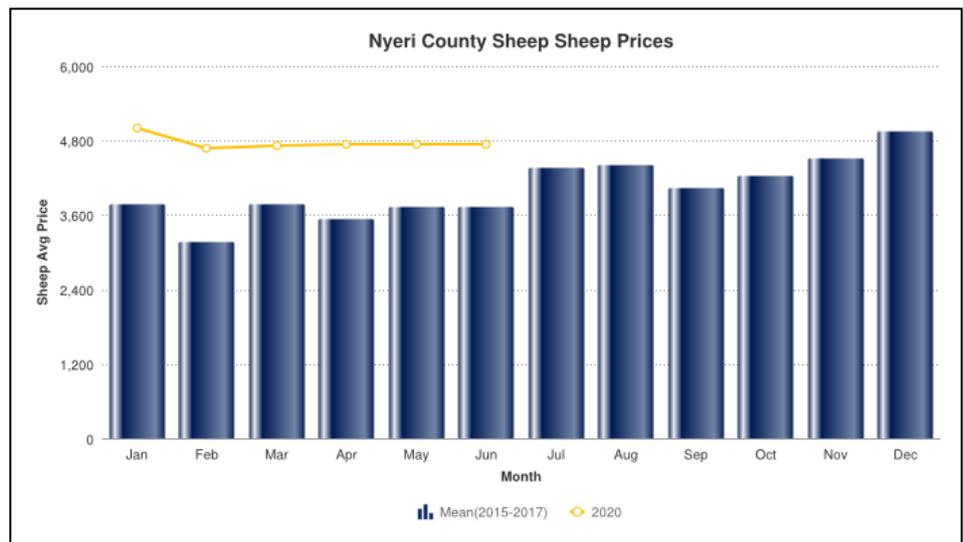


Figure 10: Outline average price trends for sheep

4.2 CROP PRICES

4.2.1 Maize prices

- Maize prices were relatively stable during the month under review compared to the previous month. This could be attributed to availability of maize stock at the household level from the October-November-December season.
- A kilo of maize retailed for Ksh 42.4 in June which is quite

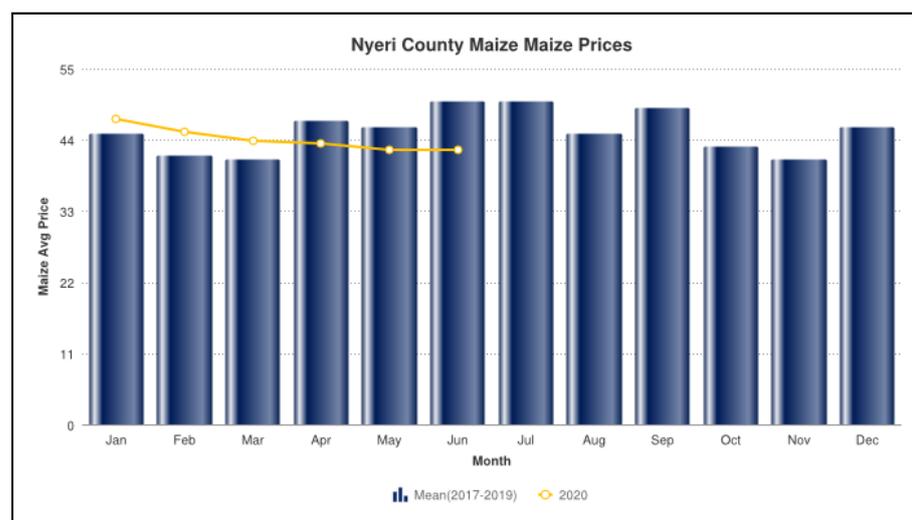


Figure 11: Outlines average price trends for Maize

comparable to Ksh 42.5 in May.

- Compared to the short-term averages of Ksh 50, the registered price was lower by 15 percent as shown in figure 11.

4.2.2 Beans

- A kilo of Beans retailed for Ksh 97 in June from Ksh 90 in May, registering eight percent increase.
- The increase in prices could be attributed overreliance of markets for supply. Households do not have beans stocks from OND season.
- The month's prices were higher by two percent, compared to the 2017-2019 short term average of Ksh 95.

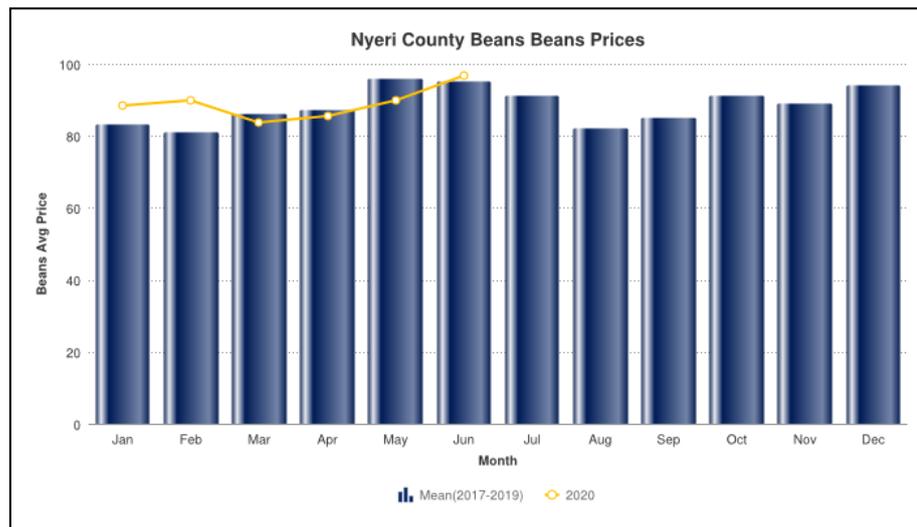


Figure 12: Outlines average price trends for Beans

4.2.3 Livestock Price Ratio/Terms of Trade

- A kilo of sheep was equivalent to 112 kilograms of maize similar to the previous month. This could be attributed to stability of Maize and sheep prices during the month under review compared to the previous month.
- Compared to the 2017-2019 short term average of 89 current TOT was higher by 26 percent as outlined in figure 13.

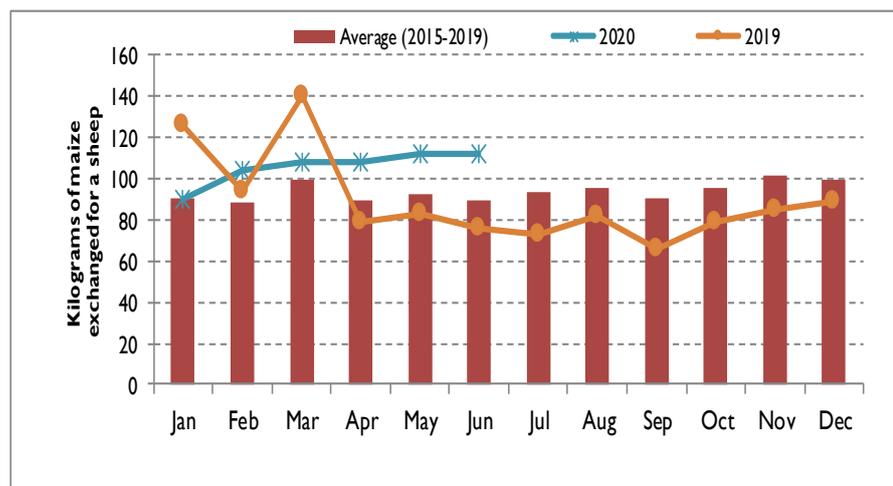


Figure 13: Outlines terms of trade in Kiari

5.0 FOOD CONSUMPTION AND NUTRITION STATUS

5.1 MILK CONSUMPTION

□ Milk consumption has been stable since January. Consumption stood at 1.6 litres in the month of June which was quite comparable to 1.7 litres in the previous month.

□ Households in marginal mixed farming consumed more milk at 1.7 litres per day compared to 1.5 litres in mixed farming livelihood zones.

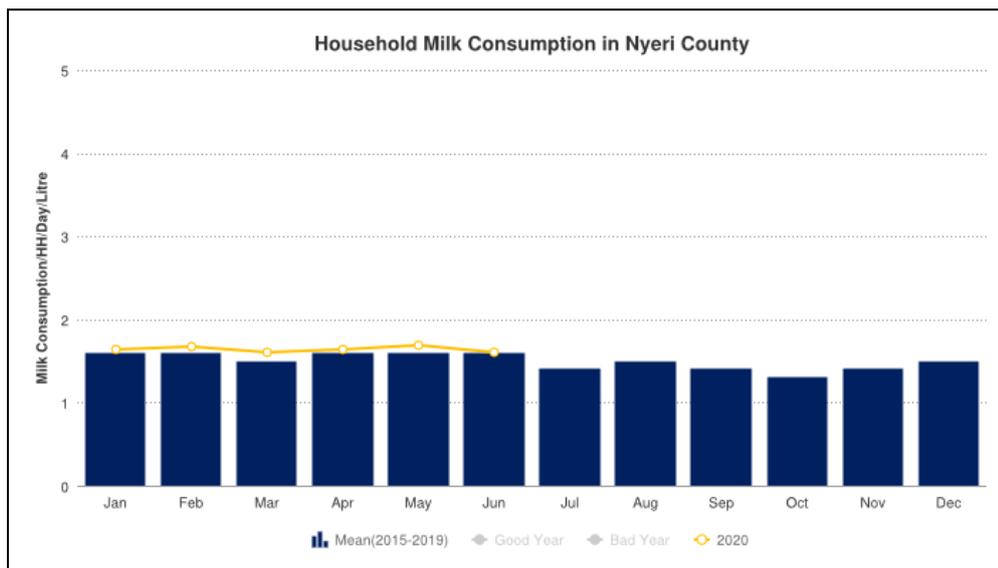


Figure 14: Outlines milk consumption for the county

□ Households sold the remainder to the various co-operatives that are operating in the region.

□ Compared to the 2015-2019 short term average of 1.6 litres, the month's consumption was within the threshold as shown in figure 14.

5.2 FOOD CONSUMPTION SCORE

□ The food consumption score for Kieni remained stable during the month under review compared to the previous month. This is attributed to availability of adequate maize stocks from the OND season coupled with accessibility of tradition vegetables and other short cycle maturing crops from the MAM rains. Proportion of households with acceptable, borderline and poor food consumption

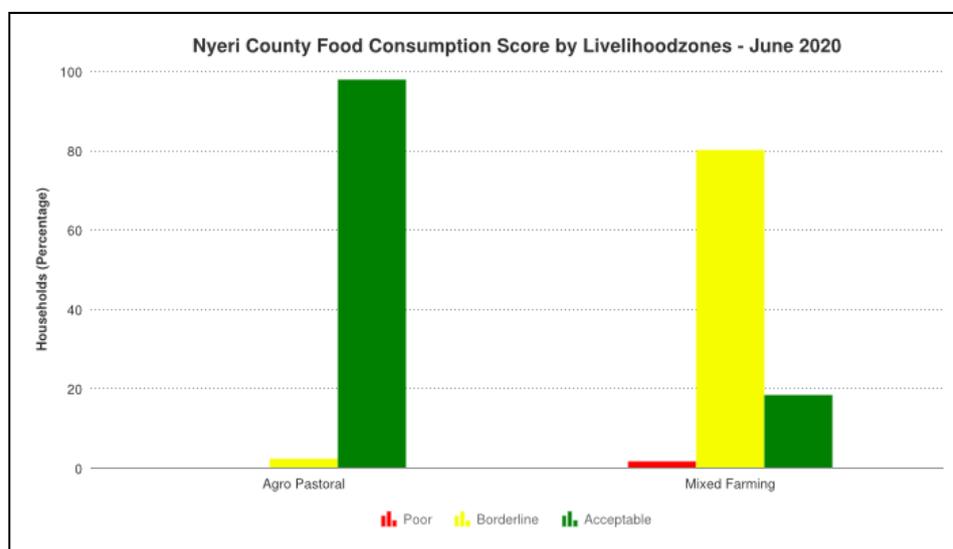


Figure 15: Presentation of food consumption score by livelihood

score in the sampled population was 52 percent, 47 percent and one percent respectively compared to 47 percent and 53 percent at acceptable and borderline respectively in May.

□ The marginal mixed farming livelihood zones fared better, since 97.8 percent of the households had acceptable food consumption score compared to 18.3 percent in mixed farming livelihood zones, attributed to poor dietary diversity in mixed farming zones.

□ One percent of the households in Mixed Farming Livelihood zones had a poor food consumption score.

5.3 HEALTH AND NUTRITION STATUS

5.3.1 Nutrition Status

- There were no reported cases of under-five children at risk of malnutrition during the month under review.

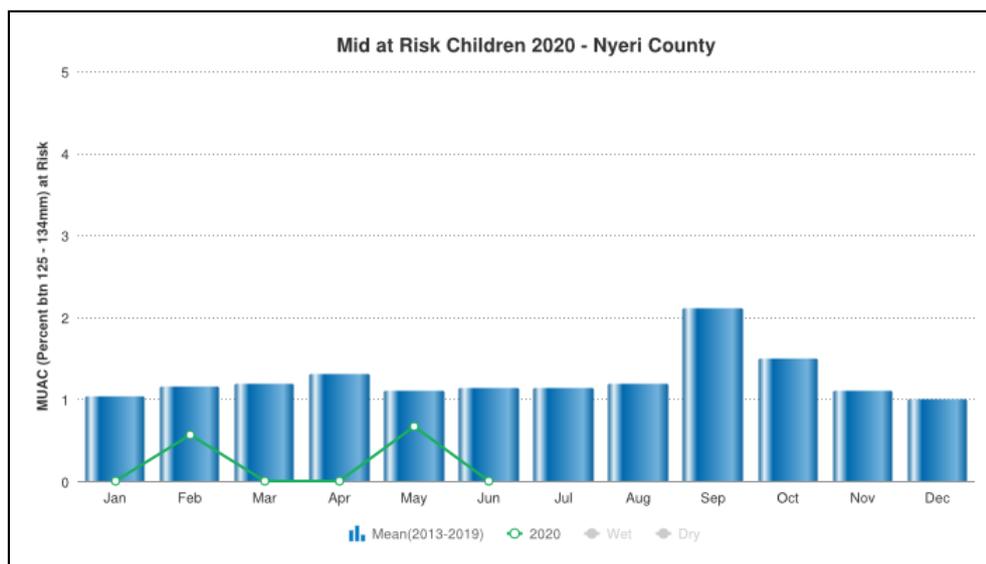


Figure 16: Presentation of nutrition status of children below five years

5.4 COPING STRATEGIES

- The coping strategy index stood 4.35 in June, 15.5 percent drop from the month of May. This is an indication that households were coping less frequently, attributed to availability of adequate maize stocks from the OND season coupled with accessibility of tradition vegetables and other short cycle maturing crops from the MAM rains as well as adequate milk.

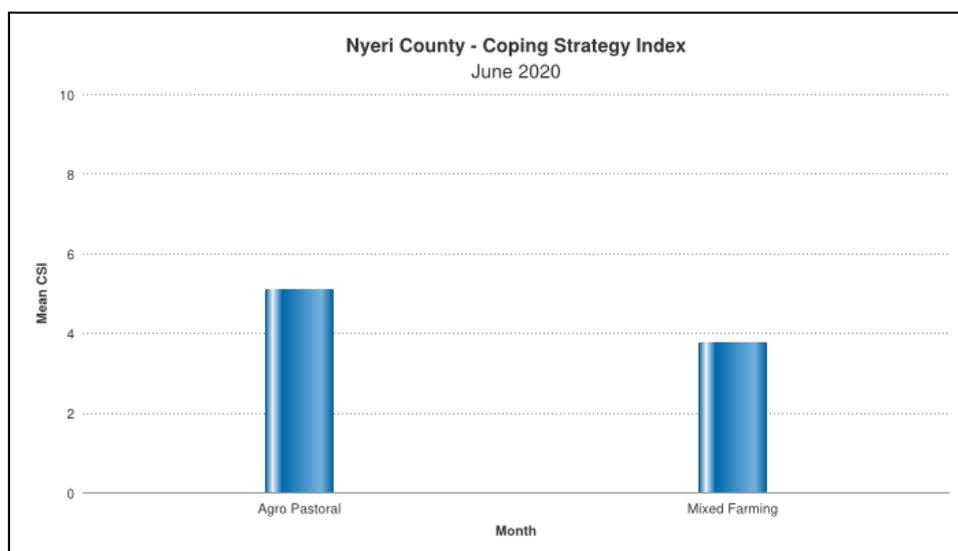


Figure 17: Presentation of the CSI for Kieni by livelihood zones

- Households in Marginal mixed farming livelihood zones applied coping mechanisms more often compared to those in Mixed farming livelihood zones as indicated in figure 17.

The main coping strategies applied by vulnerable households were reliance on less preferred food, restricting adult consumption for children to eat and reducing daily meals intake.

6.0 CURRENT INTERVENTION MEASURES (ACTION)

6.1 NON-FOOD INTERVENTIONS

- Iron and folate supplementation among pregnant women.
- Offering HINIYC services at the health facilities.
- Public awareness on the covid 19 pandemic.

6.2 FOOD AID

- Cash transfers under the Inua Jamii programme was ongoing. The targeted persons were those above 70 years, the disabled and the most vulnerable in Kieni constituency. At least

5,149 persons above 70 years and 149 disabled persons have benefitted from the programme so far.

7.0 EMERGING ISSUES

- Incidences of human wildlife conflict were reported in Kabarú and Thegu warrd in Kieni East Sub County. Farmers are counting huge losses after maundering elephants invaded their farms leaving a trail of destruction.

7.1 FOOD SECURITY PROGNOSIS

- Household food security is likely to remain stable attributed to availability of maize stock from the OND season coupled other short cycle maturing crops from the MAM season. Harvesting of seasonal crops is expected to begin in August, this will most likely cushion the households further.
- The forage and water resources are expected to decline leading to deterioration in livestock body condition, decrease in milk production and increased trekking distances to water sources. This will most likely lead to a decline in livestock prices and an increase in malnutrition cases for under-fives. Terms of trade are likely to be unfavourable for livestock keepers.
- Prices for food commodity are likely to decline in next three months, this will lead to improved purchasing power at the household level.

8. RECOMMENDATIONS

- Sensitize households on water harvesting methods, modern irrigation technologies and storage harvesting (CGN).
- Capacity building on post-harvest management. (NDMA).
- Sensitize farmers on soil fertility management (CGN).
- Livestock disease surveillance and deworming (CGN).
- Sensitize farmers on fodder modern harvesting and storage (CGN)