

National Drought Management Authority

GARISSA COUNTY

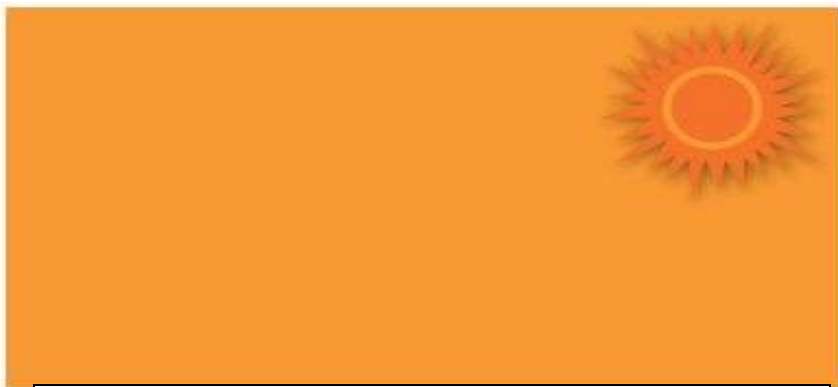
DROUGHT EARLY WARNING BULLETIN FOR AUGUST 2019



A Vision 2030 Flagship Project



AUGUST EWS PHASE



Drought Situation & EW Phase Classification Biophysical Indicators

- There was no rainfall received in the month under review in the entire county. Dry, hot and windy weather condition persisted throughout the month.
- The average greenness for the county as per the vegetation condition index for 3 months increased from 28 to 30.47. But remained within moderate vegetation deficit category.
- All subcounties are in moderate vegetation deficit category except Ijara sub county which is in normal vegetation greenness.
- The current water sources are river, boreholes, and few water pans.

Socio Economic Indicators (Impact Indicators)

- 92% of sampled communities reported poor livestock body condition with a score of 3-4 and 8% reported fair livestock body condition with a score of 2-3.
- The terms of trade for the month was 39 kg of maize per goat sold, when compared with the previous month the terms of trade slightly reduced.
- The average livestock return distance to water sources was 28.6km. When compared with previous month distance decreased by 14.4%.
- The mid-at-risk levels for children under five years was 16.6% indicating above normal. Severely malnourished at 0.3%.

Early Warning Phase Classification

Livelihood Zone	Phase	Trend
Agro-pastoral	Alarm	Worsening
Pastoral cattle/sheep	Alarm	Worsening
Pastoral-all species	Alarm	Worsening
County	Alarm	Worsening
Biophysical Indicators	value	Normal Range/Value
Rainfall (% of Normal)	Nil	80 -120
VCI-3Month	30.47	>35
Forage condition	poor	Good
Production indicators	Value	Normal
Livestock Body Condition	3-4	1
Milk Production	1.8	2.5litres
Livestock Migration Pattern	Out migration	Normal
Livestock deaths (from drought)	No death	No death
Access Indicators	Value	Normal
Terms of Trade (ToT)	39.0	>66
Milk Consumption	1.6	2.5 litres
Return distance to water sources	28.6	<5 Km
Cost of water at source (20 litres)	5	<5Kshs
Utilization indicators	Value	Normal
Nutrition Status, MUAC (% at risk of malnutrition)	16.6	<13.4
Coping Strategy Index (CSI)	9.8	<20
Food Consumption Score	10	>35

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

1. CLIMATIC CONDITIONS

1.1 RAINFALL PERFORMANCE

- There was no rainfall received during the month.
- The long dry spell continues in all parts of the county



Figure1&2 Ijara and Garissa rainfall &NDVI

2. IMPACTS ON VEGETATION AND WATER

2.1 VEGETATION CONDITION

2.1.1 Vegetation Condition Index (VCI)

- The average greenness for the county as per the vegetation condition index for 3 months increased from 28 to 30.47 but remained within moderate vegetation deficit category.
- All subcounties are in moderate vegetation deficit category except ijara subcounty which in normal vegetation greenness
- When compared with the same period in 2018 the vegetation condition index was worse .
- It is expected the trend to decrease for all subcounties except as we sets in the hight of drought period.
- When compared with the long term2012-2018 the current period was worse
- The trend is expected to deteriorate further

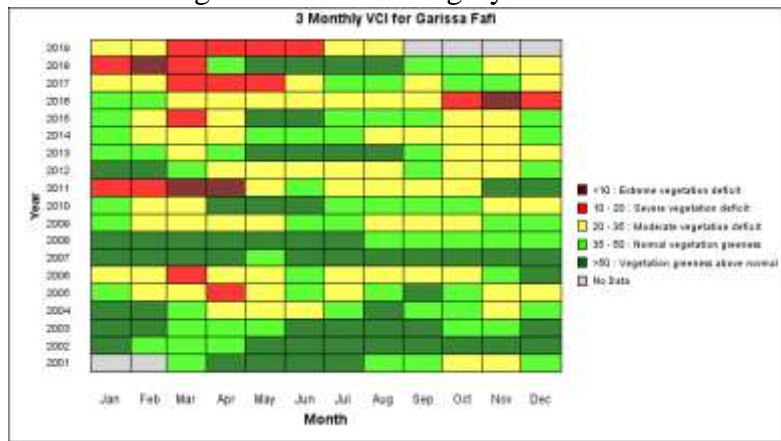


Figure 3: Garissa VCI for 3 month

2.1.2 Pasture condition

- 96 % of the sampled communities reported poor pasture condition,4% reported fair pasture condition.
- The quality and quantity of pasture condition continue to reduced when compared with previous months.
- The down ward trend was due to the effect of the worsening dry spell coupled with livestock concentration around the rangeland fall back areas.
- The current condition when compared with the long term average it was worse.
- The current pasture is expected to last for less than a month. As most remaining herds are fed at home.

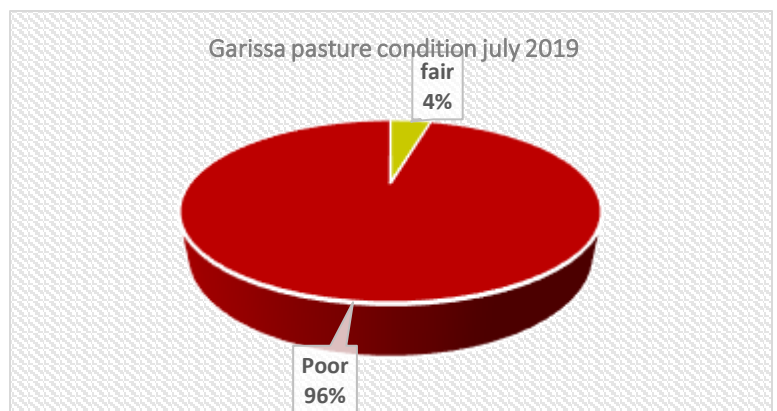


Figure.4 pasture condition

2.1.3 Browse

- 88% of sampled communities reported poor browse condition while 12% and 13% reported fair condition.
- The browse condition continues to reduce in quality and quantity in all the livelihoods zones.
- When compared with the previous month the browse condition had deteriorated
- The negative trend was attributed to over grazing by high livestock concentrations in some areas that compounded by poor browse regeneration from the last rainy season.
- The browse condition is expected to last for less than a month.

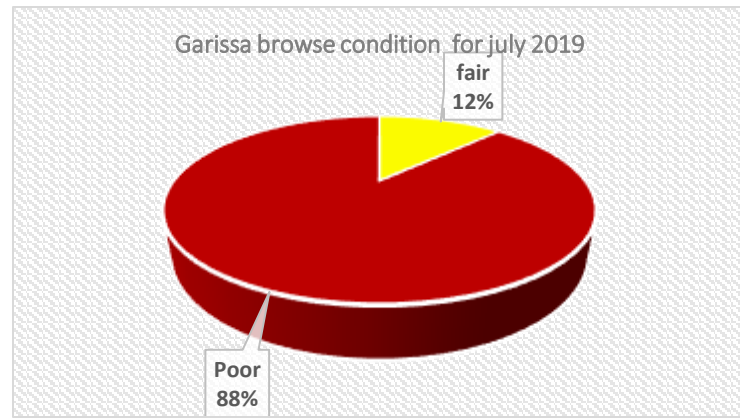


Figure 5. browse condition

2.2 WATER RESOURCE

2.2.1 Sources

- The current water sources are Boreholes, River Tana, and Pans/dams.
- These sources are reducing as most water pans have dried up.
- In some areas households are dependent on water trucking as a source of water.
- On the northern parts of the county there is high livestock concentration on boreholes.
- Availability of water reduced when compared with previous month.
- Access to water sources was reduced due to high concentration of livestock at watering point thus increasing waiting time.
- On the southern parts livestock are dependent on river water through constrained by limited access due to blockage of watering corridors by farmers

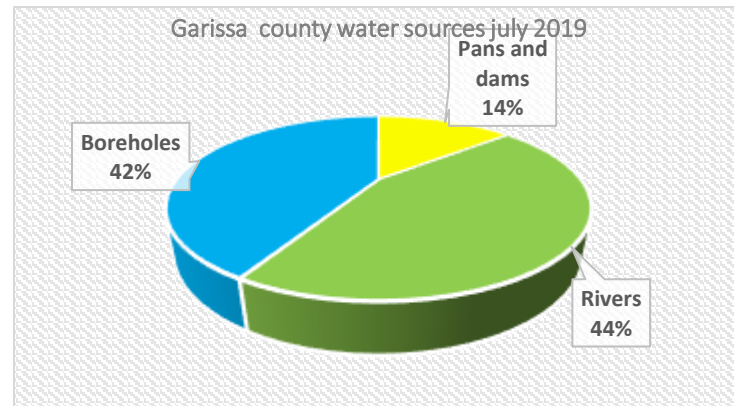


Figure 6. water sources

2.2.2 Household access and Utilization

- The average households return distances to water sources 12.8 km
- The return distance increased when compared with the previous month by 7%.
- The trend was attributed to reducing water sources for households.
- The pastoral livelihood zone reported the lowest trekking distance of 6.5 km.
- Pastoral all species livelihood zone recorded the highest trekking distance of 14.2km
- The return distance is more than the long term mean by 65.7%.

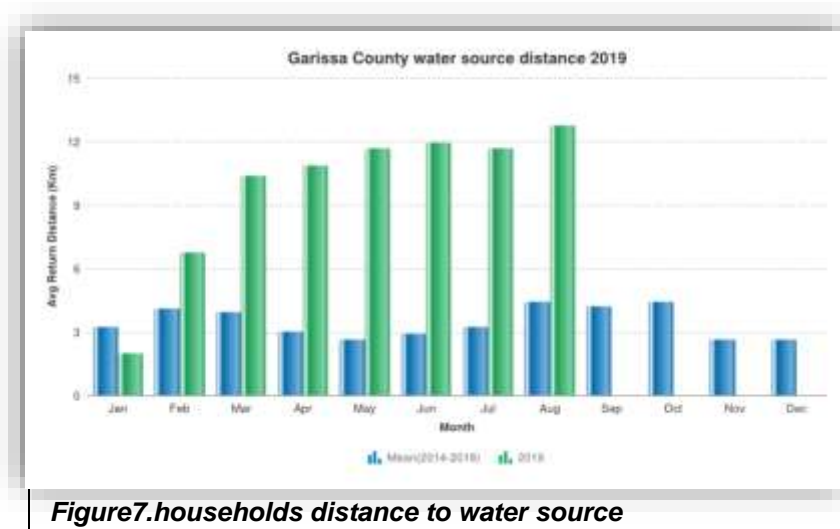


Figure 7. households distance to water source

2.2.3 Livestock access

- The average livestock return distance to water sources was 28.6km for the month under review.
- When compared with the previous month the distance increased by 13%.
- The decreased return distance was as a result of pastoralists migrating to areas with better pasture and water especially in the southern parts of Fafi and Ijara sub counties.
- The current trekking distance was above the long term average recorded by 39.8%.
- Livestock watering interval for the month was, cattle and small stocks after every day, camel after 5 days.
- The distance when analysed by livelihood zone shows, pastoral all species at 20.1km, Agro pastoral 19km, formal employment 14km and pastoral cattle/sheep with 17km.

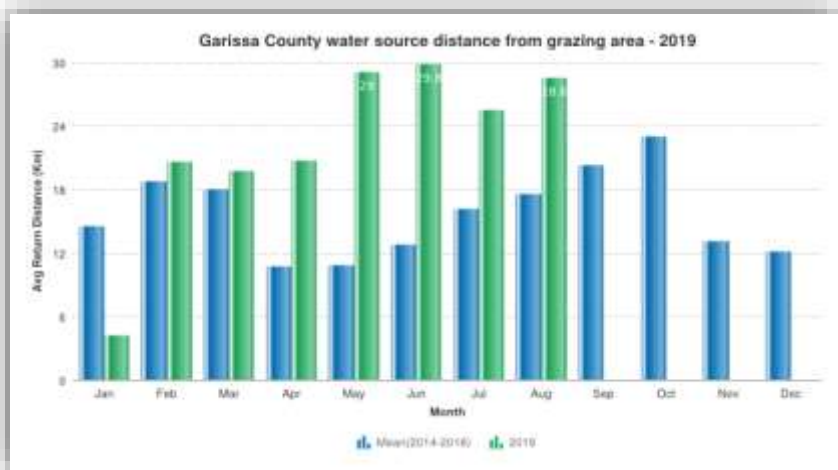


Figure 8. Return distance from grazing areas to water sources

3.0 PRODUCTION INDICATORS

3.1 LIVESTOCK PRODUCTION

3.1.1 Livestock Body Condition

- 92% of sampled communities reported poor livestock body condition with a score of 3-4 and 8% reported fair
- Lactating herds and wean Cattle and sheep registered poor body condition while goats and camel were in fair body condition.
- Generally, the livestock body condition for all species deteriorated when compared with previous month.
- Most livestock species moved to the fall back areas and remained outside the county.
- Remaining herds are fed at household's level with feeds supplements provided and some purchased from the markets

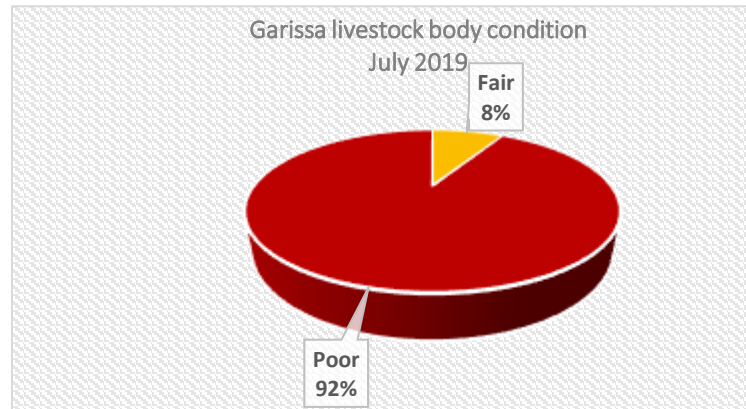


Figure9.Livestock body condition

3.1.2 Livestock Diseases

- There was suspected outbreak of PPR in dadaab sub county reported during the month.
- However, there was upsurge of contagious caprine pleuropneumonia in in goats, cases of Trypanosomiasis in cattle.

3.1.3 Milk Production

- The average household milk production was 1.8litres
- The current milk production level when compared with the previous month increased by 27.8%.
- The main producers of the milk for the month were camel and cattle. Though in the agro pastoral goats milk was reported and had impact on the increase production.
- The downward trend was due to deteriorating forage condition and trekking distance that led to declined livestock body condition.
- The month milk production was below the long term average recorded by 38%. (figure10)
- Agro pastoral livelihood zone recorded the highest milk production of 3 litres while pastoral all species recorded the lowest production of 0.8litres
- The milk market price for 750ml bottle remained the same when compared with the previous month at Ksh100.

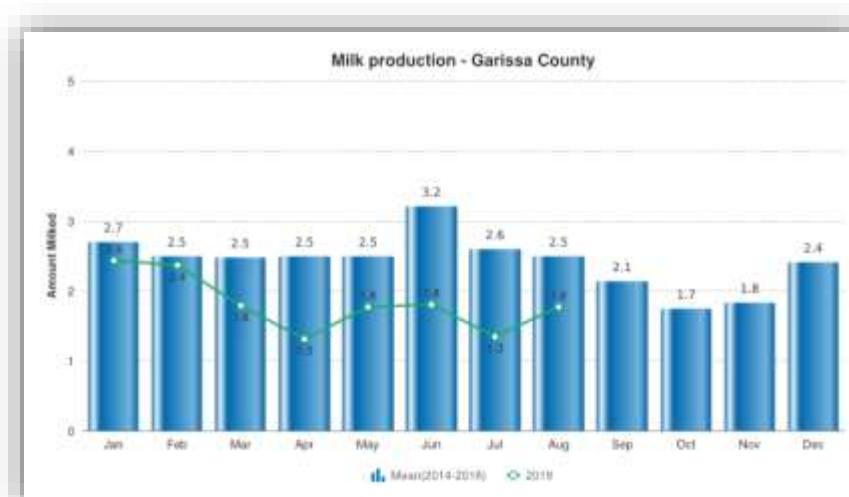


Figure 10. Milk production

3.2 RAIN-FED CROP PRODUCTION

3.2.1 Stage and Condition of food Crops

There were no crops planted in the month under review as there were no rains received

4.0 MARKET PERFORMANCE

4.1 LIVESTOCK MARKETING

4.1.1 Cattle Prices

- The average price of 4-year-old medium size bull was kshs 14536.
- The current average price when compared with the previous month slightly increased by 2%
- The trend was due to poor livestock body condition and distances to markets coupled by low demand from local traders.
- When compared with the previous year the current price was lower by 29%
- When compared with the long-term average the current price was within the range.
- The prices by livelihoods are pastoral livelihood zone

ksh 20385, pastoral All species livelihood zone ksh 13442, Agro pastoral livelihood zone ksh 17345 and formal employment recorded no sale of cattle during the month

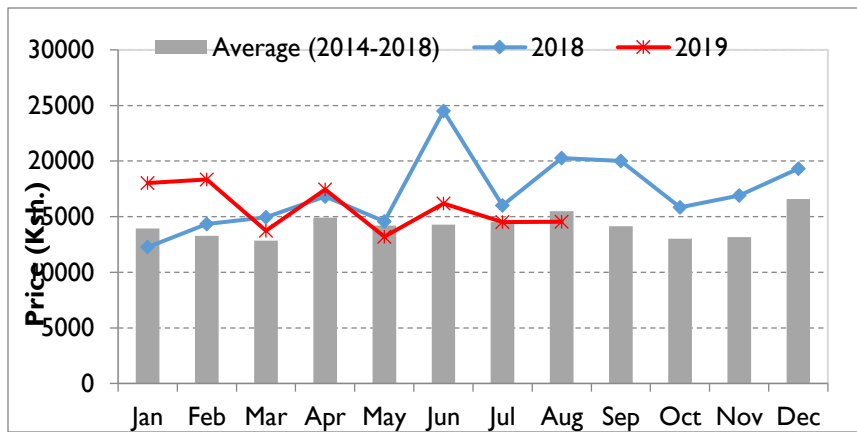


Figure 11. Trend of cattle prices

4.1.2 Small Ruminants Prices (Goats)

- The average price of 2-year old medium size goat was kshs 2656 in the month under review
- The current price when compared with the previous month decreased by 4%.
- When compared with the long term average the price reduced by 11.3%
- The current price was below the previous year price for the same period by 23.4%
- The downward trend was attributed to declining body condition and poor demand from traders.
- The prices vary by livelihoods zones, Agro pastoral livelihood zone recorded ksh2954 pastoral livelihood zone ksh 2734, pastoral all species kshs.2470 and formal employment livelihood zone ksh 3050

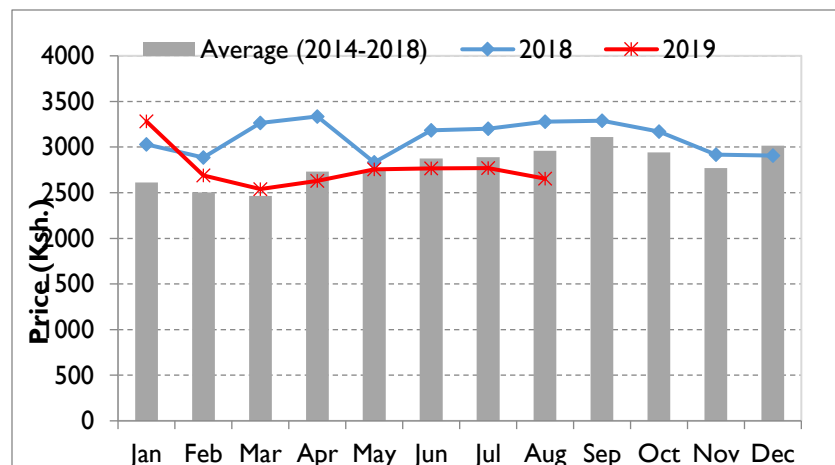


Figure 12. Trend of goats price

4.2 CROP PRICES

4.2.1 Maize

- The average price of maize was kshs 68 per kilogram in the month under review
- When compared with the preceding month the price remained stable.
- The trend was due to availability of other cereals in the market were equally used as livestock feeds supplement
- The current price was above the long term mean for the month recorded at ksh 56per Kg by 17%
- The price when compared with the same period of the previous year was above by 6.2%.
- The price of maize was highest in pastoral all species livelihood zone

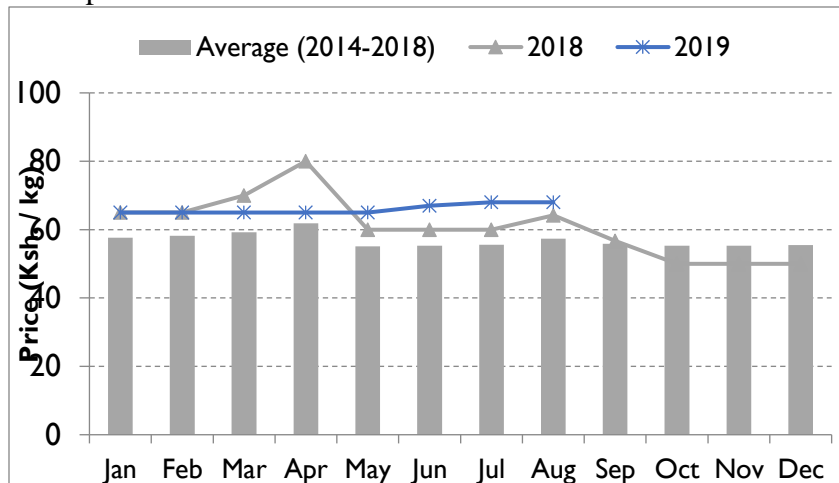


Fig 13: Trends of Maize grain prices 2014 -2018

4.2.2 Sifted Maize Meal

- The average price of sifted maize meal was Kshs100 per kg for the month under review
- The current price when compared with the preceding month remained stable, but considered high for the pastoralist
- The average price was lowest in the formal employment livelihood zone at ksh.90
- The price was above the short term mean by 5%
- The current price when compared with the same period for the previous year was above by 5%.

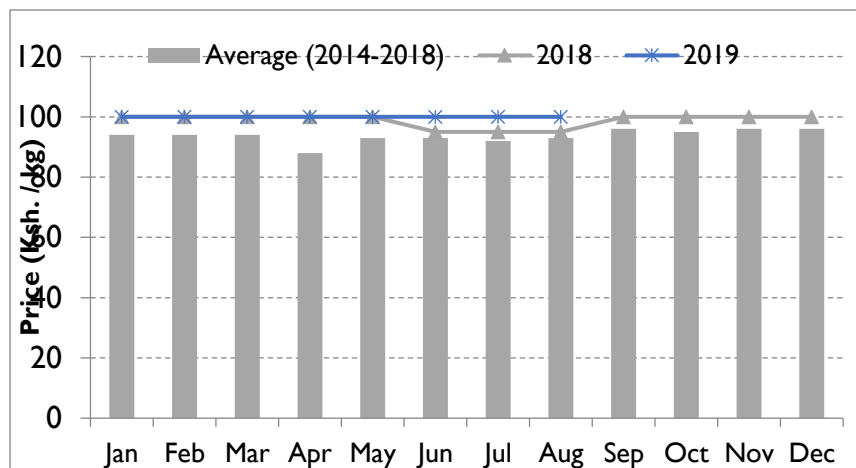


Fig 14: Trends of Sifted Maize Meal prices 2016 -2018

4.2.3 Livestock Price Ratio/Terms of Trade

- The terms of trade for the month was 39 Kg of maize per goat sold.
- The terms of trade was highest in the formal employment livelihood zone at 45kg per goat sold and lowest in the pastoral all species livelihood zone at 30.4kg per goat sold.
- The price when compared with the same month of the previous year was below by 41%
- The current term of trade was not favourable to livestock farmers

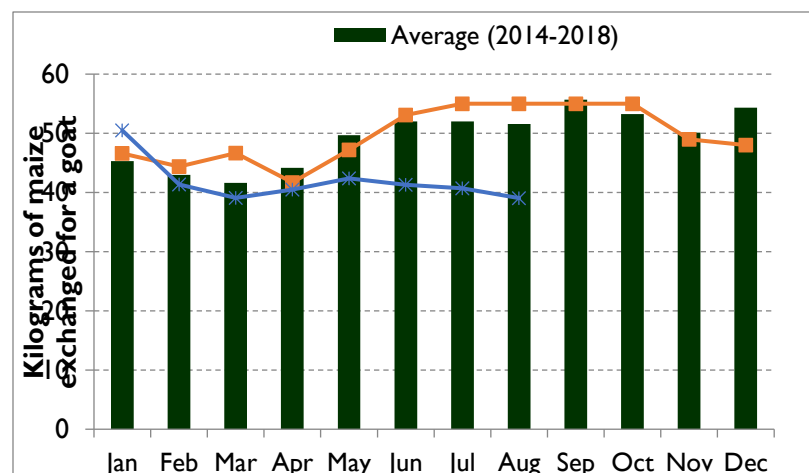


Fig 15: Trends of terms of trade 2016 -2018

5.0 FOOD CONSUMPTION AND NUTRITION STATUS

5.1 MILK CONSUMPTION SCORE

- The average household milk consumption was 1.6 litres in the month under review
- The current average consumption when compared with the previous month increased by 13%
- The trend was related to milk production at household level and in agro pastoral that reported milk from goats.
- The average milk consumption was below the long term average by 10%.
- The agro pastoral livelihood zones recorded the highest consumption of 1.9litres while the pastoral all species recorded the lowest consumption level of 0.5 litres.

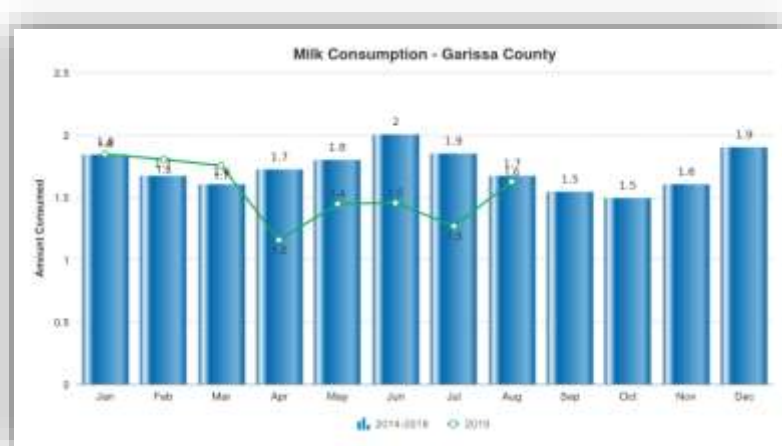


Fig 16: Trends of milk consumption 2016 -2018

5.2 FOOD CONSUMPTION SCORE

- The proportions of households in poor food consumption score was 10%.
- When compared with the previous month the percentage of households with poor food consumption slightly reduced by
- Households with borderline food consumption score was 35.6%
- Fafi sub county reported the highest proportions of households with. poor food consumption score at 23%.
- The pastoral all livelihood zone recorded the highest households with food consumption score of 32.8%
- Dadaab sub county has the highest households with borderline food consumption score at 64% which may slide into the poor category as the drought continues.

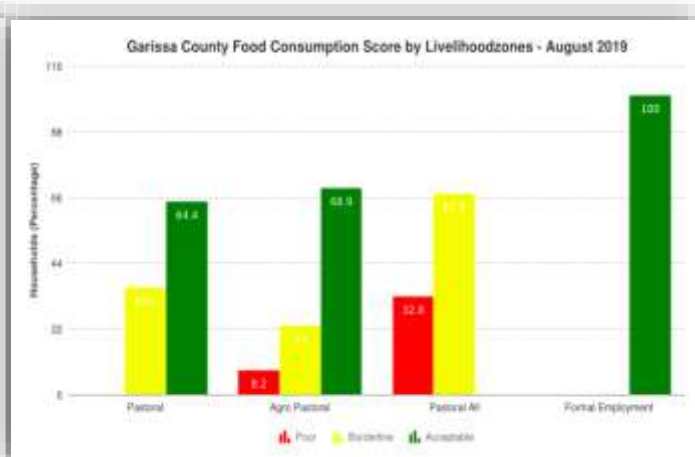
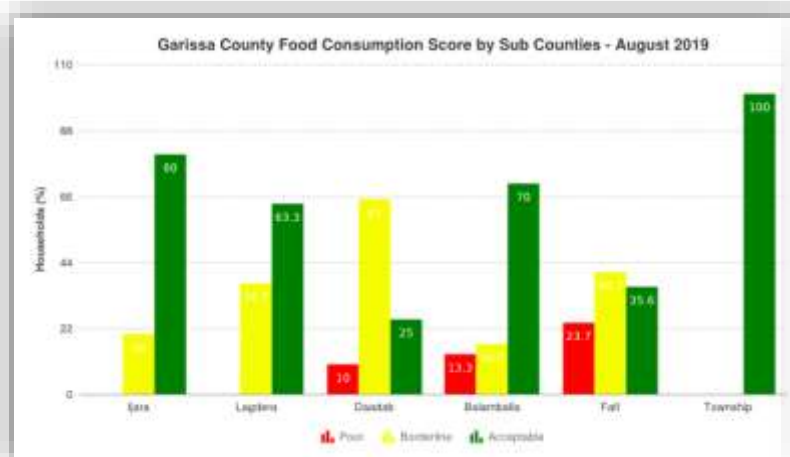


Fig 17&18: food consumption score by livelihood zone and by sub counties

5.3 HEALTH AND NUTRITION

5.3.1 Nutrition Status

- The mid at risk level of children under-five was 16.6% in the month under review.
- When compared with previous month the at risk level increased by 7%.
- The severely malnourished was at 0.3% for the month
- The situation was stabilised by ongoing outreaches services
- When compared with the previous year the current at risk level was higher by 17%
- In addition, the current mid at risk level was within long term mean range.

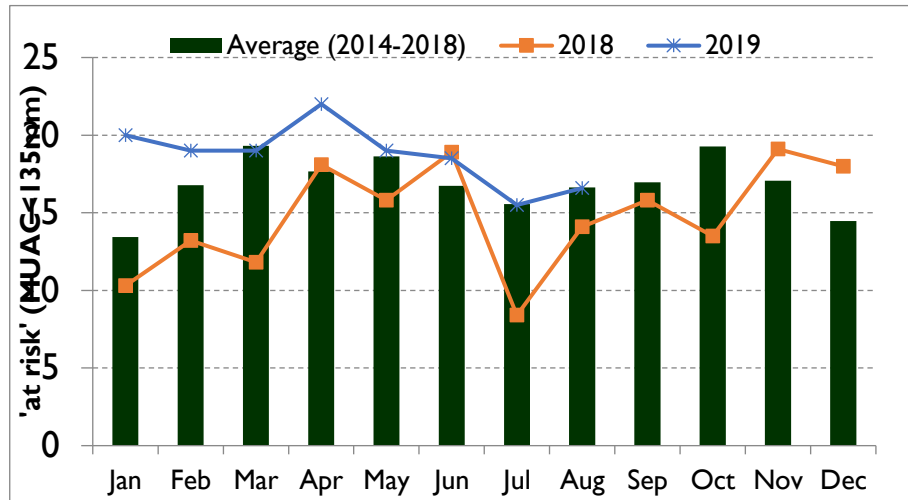


Fig.19.Trends in mid at risk to malnutrition

5.3.2 Health

- There was outbreak of cholera and kalazar in the county, there was 600 line listed cases of cholera in the county, though it was managed and few cases are reported on daily basis.
- Kalazar is new to the county and it is reported to be drought related, it was reported in Gurufa of Lagdera sub county and saka of balambala sub county.
- Other common diseases reported during the month were increased cases of diarrhoea and pneumonia

5.4 COPING STRATEGIES INDEX

- The mean coping strategy index (CSI) in the month of August was 9.8
- The trends in CSI indicated slight increase in severity but high in the formal employment livelihood zone.
- This was due to high prices of commodities and reduced income sources of the pastoralist.
- When compared with previous month the coping strategy increased by 21%
- The strategies employed mostly by households include reliance on less preferred and less expensive food as well as reduced portion or size of meals.

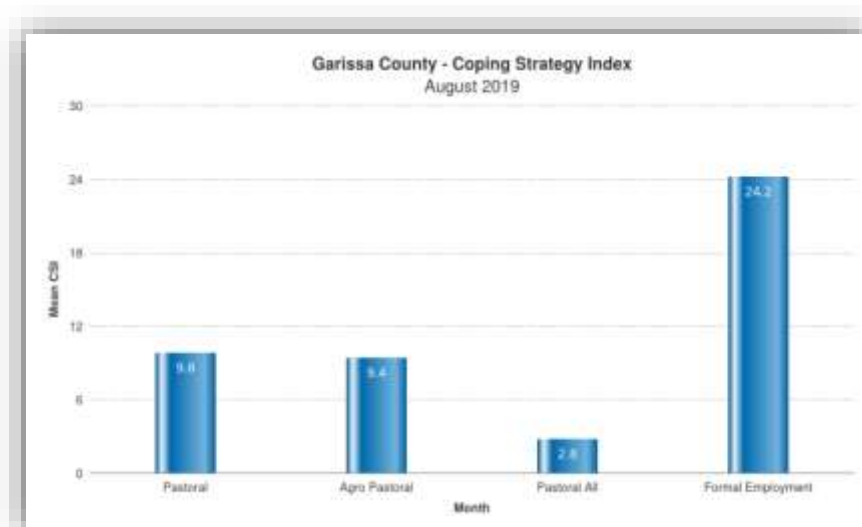


Figure.20 coping strategy index

6. CURRENT INTERVENTION MEASURES (ACTION)

6.1 NON-FOOD INTERVENTION

Table 1 Non-food interventions

Activity	Beneficiaries	Implementers
Water trucking for Lagdera sub county	121 Centres	NDMA/COUNTY GOVERNMENT
Livestock feed supplementation (10200 bags)	7286cattle .	RPLRP
Integrated health and nutrition outreaches	60 hots pots	HEALTH/TDH /KRCS
Cash transfer to vulnerable households	4800h/h	IRK/KRCS/RRDO
Drilling of 3 boreholes	12000H/H	COUNTY GOVERNMENT
Management of cholera and kalazar outbreak	160 cases	HEALTH /WHO/UNICEF

6.2 FOOD AID

- Prepositioning and provision of supplementary feeding programme for the management of malnutrition in the health facilities targeting 1450 children.
- GOK food aid distribution to vulnerable households in the county.

7. EMERGING ISSUES

7.1 Insecurity/Conflict/Human Displacement

There was resource based conflict reported in parts of ijara sub county bordering with tana river county. The main source of conflict being blockage of watering corridors along the river for the pastoralist.

7.2 Migration

No livestock migration was reported during the month, however livestock remain outside the county in neighbouring counties of Wajir, Lamu and cross border to Somalia.

7.3 FOOD SECURITY PROGNOSIS

- Water sources continue to reduce thus likely to affect access and availability of water for both livestock and households, it is anticipated to affect further livestock production.
- The forage condition is expected to continue decreasing both in quality and quantity will may affect the livestock body condition negatively thus likely to affect further the poor prices realised during the month.
- The downward trend on livestock production will lead to food insecurity.
- Dadaab sub county need to monitored for the outbreak of cholera as it may recur
- Ijara sub county –parts of the sub county dependent on water pans were depleted are expected to require water trucking and there is need to monitor.

8. RECOMMENDATIONS

Table 2. Recommended interventions

Sector	Sub County	Recommended Intervention
Livestock	Balambala/Dadaab/Lagdera /Fafi and township and Ijara	Upscaling of Supplementary feeding for week / lactating herd and small stock
	Lagdera /Balambala/dadaab /fafi	Destocking of small stocks
	Lagdera /Balambala/dadaab /fafi	Supportive treatment for small stocks against worms and ectoparasites
Health	Ijara//Lagdera/Hulugho	Mapping of hot spot areas for malnutrition
	Dadaab/Lagdera/balambala /ijara /Hulugho	Upscale Integrated disease surveillance and outreach services
Water	Lagdera /Balambala	Upscale water trucking
	Lagdera/Balambala/dadaab/fafi	Provide fast moving spare parts to strategic boreholes
	Lagdera/Dadaab/Balambala /fafi	Fuel subsidy for 20 strategic boreholes
	Lagdera /Balambala	Provide water storage tanks/collapsible tanks
Security	Lagdera /ijara	Conduct peace and conflict resolution meetings in mapped hot spots
Education	Balambala/Lagdera/dadaab/fafi/ijara	Support secondary school children food for fees
Coordination	Balambala/Lagdera/dadaab/fafi/ijara/township	Increase frequency of sub county steering group meetings.