

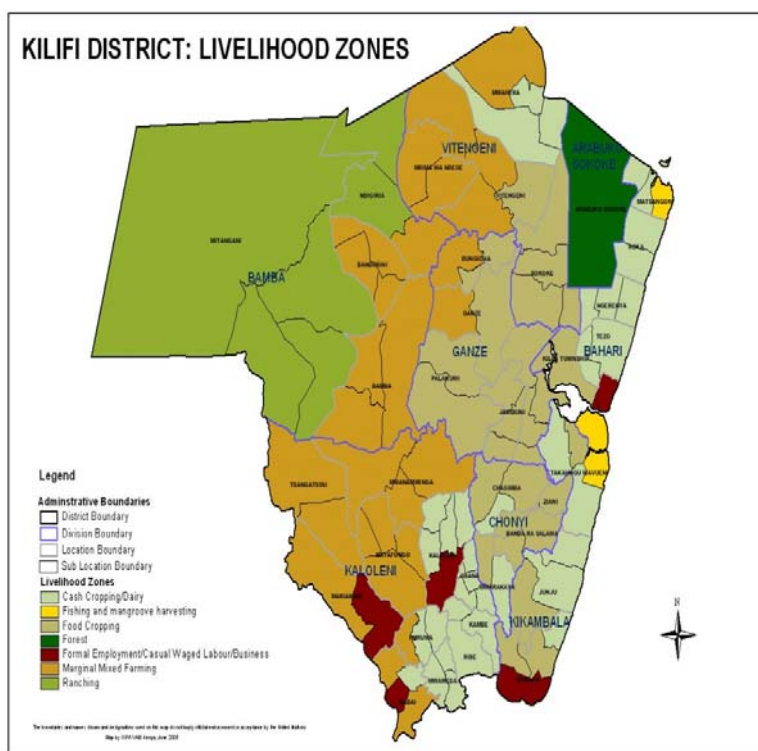


**OFFICE OF THE PRIME MINISTER
MINISTRY OF STATE FOR THE DEVELOPMENT OF NORTHERN KENYA AND OTHER ARID LANDS
ARID LANDS RESOURCE MANAGEMENT PROJECT II**

DROUGHT MONITORING BULLETIN, JUNE 2009

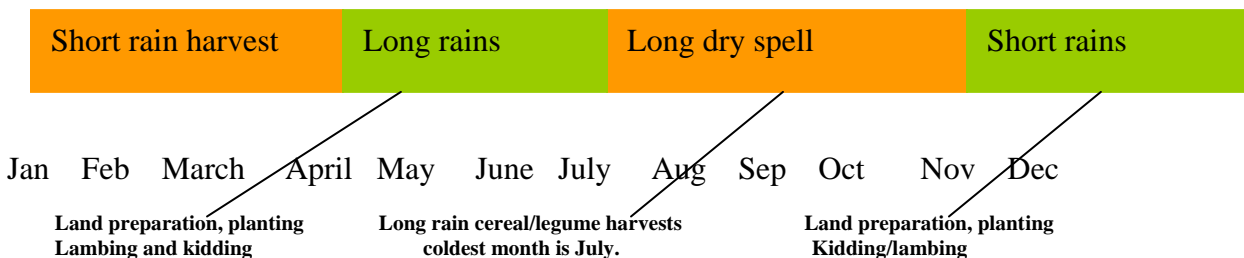
Kilifi/Kaloleni districts

Warning stages



Livelihood zone	Stage	Trend
Cash crop/ dairy	Normal	Stable
Food crop	Normal	Stable
Marginal agriculture	Alert	Static
Ranching	Alarm	Worsening
Districts	Alert	Improving

Seasonal calendar



Situation overview

- An average 78 mm was recorded for 10 days in the two districts. That was 62% of the expected amount of 126 mm in June as per the 00-05 long-term average.
- With the rains a majority of on farm crops indicated remarkable recovery mainly in the Cash cropping and in the food cropping and part of the Marginal mixed farming. In the Ranching zones, however, the body condition and production of livestock are on the decline owing to the reduction in pasture and water stress.
- Cases of Human injury caused by wildlife conflict were reported in Bamba as wildlife had moved out of Tsavo east National Park into the community farms. Cases of Elephant and Buffalo crop damage were reported in Bamba, Mnagoni and Ndigiria locations that complicates the food security of the affected households. Tension was building due to completion over scarce pasture and water resources in Tsangatsini and Mitangani.
- Household access to water showed improvement with a slight reduction in distances. In the Ranching zone however the situation was bad with households and livestock having to cover long distances to access water. This situation is likely to worsen given the persistent drought and the fact that most of the affected areas depended on support through water trucking to sustain normal operations in schools and local institutions.
- There was a marginal reduction in distances to grazing areas during the month from 4.3 km last month to 3.5km with some areas registering over 7km, especially in the hard hit parts of the District. This situation is likely to continue as presents rains are very erratic.
- Operations in livestock trade continued to face challenges as market prices continue to decline owing to food insecurity in the Marginal Mixed farming and Ranching zones. The retail price for a 3-yr old goat was Kshs 805 signaling a 23.5% decline in price as compared to Ksh1,052 in May. The price still remained below the expected long term mean of Ksh1,383 for June. The larger stock has particularly been affected by the drought forcing many farmers to relocate their herds.
- Performance of the long-rain crop showed tremendous recovery however acreages under the maize crop have continued to shrink with each subsequent replanting due to depletion of domestic resources.
- Grain prices continued to go up with June recording a 3.4%t increase from Kshs 34.6 registered last month to Ksh35.8 per kilo in June. The prices were much higher than expected in the long-term average 07-08 by 48.2%.
- Households in the two districts have had to contend with the high prices and access to the commodity has been a challenge to many households.
- Cereal prices continued to increase with a kilogram of maize retailing at Ksh35.8 as opposed to 34.6 recorded last month. This price was 44% above the long term average of Ksh25 expected at this time of the year. Minimal declines in legume prices were observed in June with a kilogram of beans retailing at Ksh82.1 compared Ksh87.2 in May in response to alternative green vegetable sources as a result of the prevailing rains. Although decreases were recorded in legumes crop prices, they were still way above the normal prices of Kshs 57 expected at this time of the year.
- Water scarcity remained the greatest challenge to institutions and households within the Ranching and Marginal mixed farming zones.
- There was a decrease in the average daily wage rate from Ksh131.5 last month to Ksh123.5 this month. This was attributed to more people looking for casual labour thus over

supplying the available market. That compromises HH alternative means of ensuring their food security.

- A cholera outbreak was reported in Bahari, Chonyi and Kikambala Divisions. Through support from ALRMP the MOH managed to mobilize his teams on the ground and the situation was contained. However surveillance of the same is ongoing throughout the entire District.
- The number of children at risk of malnutrition reduced slightly by 3% from 6.5% in May to 6.2% this month. Although this percentage was lower than the reference yr 06, related data from health facilities indicate increased admission incidences related to malnutrition. That highlights the compounding effect of food scarcity at the district level.
- All indicators considered the early warning stage for the two districts is alert with an improving trend.

Current interventions

Divisions		Cereals		Pulses	Veg.Oil	Total
		Maize (Mt)	Mml (Mt)	(Mt)	(Mt)	(Mt)
1	Ganze	57.75	57.93	20.45	6.129	142.45
2	Vitengeni	58.45	58.50	20.60	6.195	143.74
3	Bahari	8.55	8.6	3.00		21.05
4	Bamba	63.7	63.73	22.50	6.724	156.65
TOTALS		188.65	188.75	66.55	19.95	463.90
Divisions		Cereals		Pulses	Veg.Oil	Total
Kaloleni		9.100	9.075	3.200	0.970	22.345
Mariakani		37.750	37.750	13.300	3.968	92.768
TOTALS		46.850	46.825	16.500	4.938	115.113

Food for Assets Distribution Plan Summary Sheet EMOP

Food aid

- The Kilifi DC's office distributed maize only as shown in the table below for the month of June:-

Division	Rice (Bags)	Maize (Bags)	Beans (Bags)	Vegetable Oil (Liters)
Chonyi		-	-	-
Bamba		280	-	-
Vitengeni		170	-	-
Bahari		135	-	-
Kikambala		10	-	-
Jaribuni		140	-	-
Ganze		-	-	-
Total		735	-	-

- Distribution of Unimix to the under fives by Plan Kenya mainly in Ganze and Vitengeni.
- Screening, vaccination and nutrition support and awareness creation by the ministry of health.

Non-food interventions

The Ministry of Youth Affairs has in collaboration with the District forest officer under the Kazi Kwa Vijana program initiated a rigorous tree planting exercise targeting the youth in the dry parts of Bamba Ganze and Vitengeni divisions.

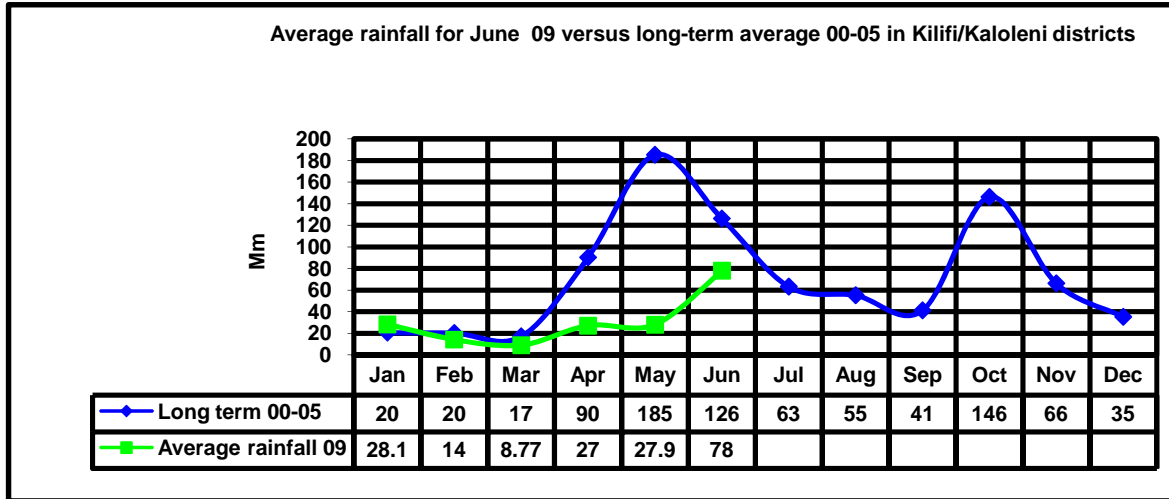
- Under the current phase of EMOP the following interventions are ongoing:-
 - 14 community farms targeting various crop enterprises
 - Desilting and expansion of 46 water pans in the focal areas in Bamba Ganze Vitengeni and Mariakani divisions.
- ALRMP initiated various food security initiatives through provision of
 - Breeding bucks for livestock farmers.
 - Purchase of KTBH Hives for farmer groups.
 - Provision of equipment to groups running tree nursery initiatives.
 - Purchase and distribution of 1500 tissue culture bananas.
 - Provision of equipment to support micro irrigation initiatives at the community level.
 - Water trucking to schools and institutions in Kaloleni and Kilifi.
 - Training of Kilifi District MOH staff on the management of acute malnutrition.
 - Preparation of the Kaloleni District Drought Contingency Plan.

Recommendations to DSG and KFSM

- Intensify the surveillance on cholera outbreak throughout the district.
- Increase the provision of supplementary feeding for the under fives to cover Bamba and Vitengeni and Mariakani divisions.
- Expansion of the Kazi Kwa Vijana to cover more of environmental rehabilitation initiatives.
- Desilting and expansion of the existing critical water harvesting structures.
- Awareness creation on water treatment through boiling to manage the current cholera outbreak.
- Promotion of livestock off-take in the hard hit areas of the District namely Bamba and Mariakani Division.
- Promotion of early maturing crop to capitalize of the prevailing rains.

1.0 Environmental indicators (Stability)

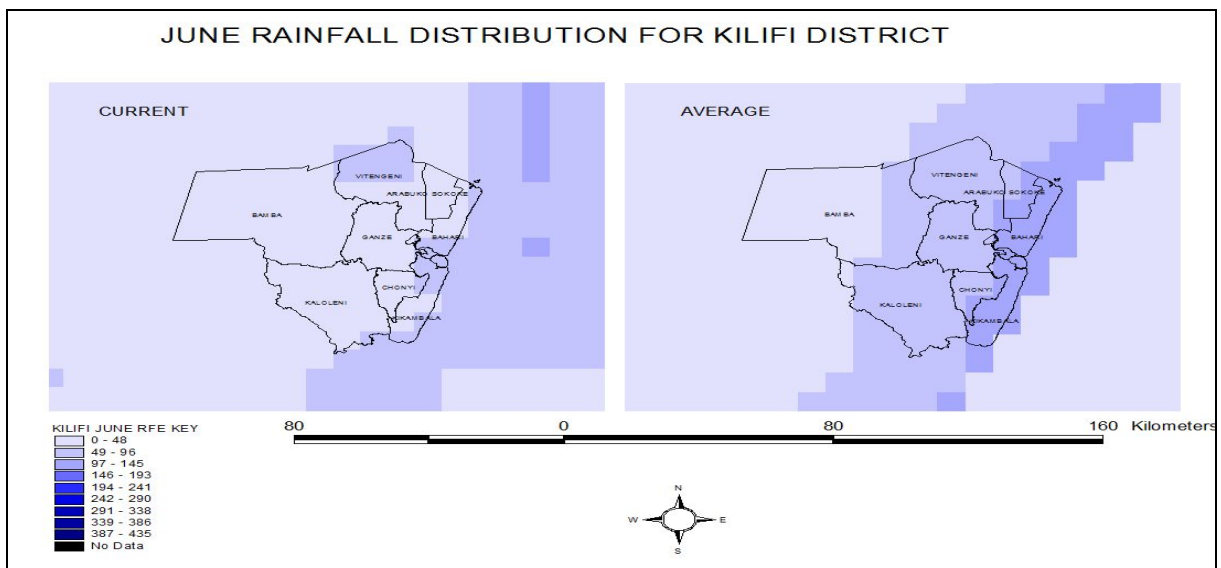
1.1 Rainfall



n=12

1.1.1 Amount of rainfall

- During the reporting month a total 78 mm of rainfall was recorded in 10 days. This was much better compared to the 27.9 mm recorded in May.
- However, the recorded amounts were far much below the expected average of 126mm for June. The rains were mainly confined in the Food cropping and the Cash cropping and Dairy livelihoods.
- This was evident even in the remote-sensed data of the Normalized Difference Vegetative Index (NDVI) as shown below.

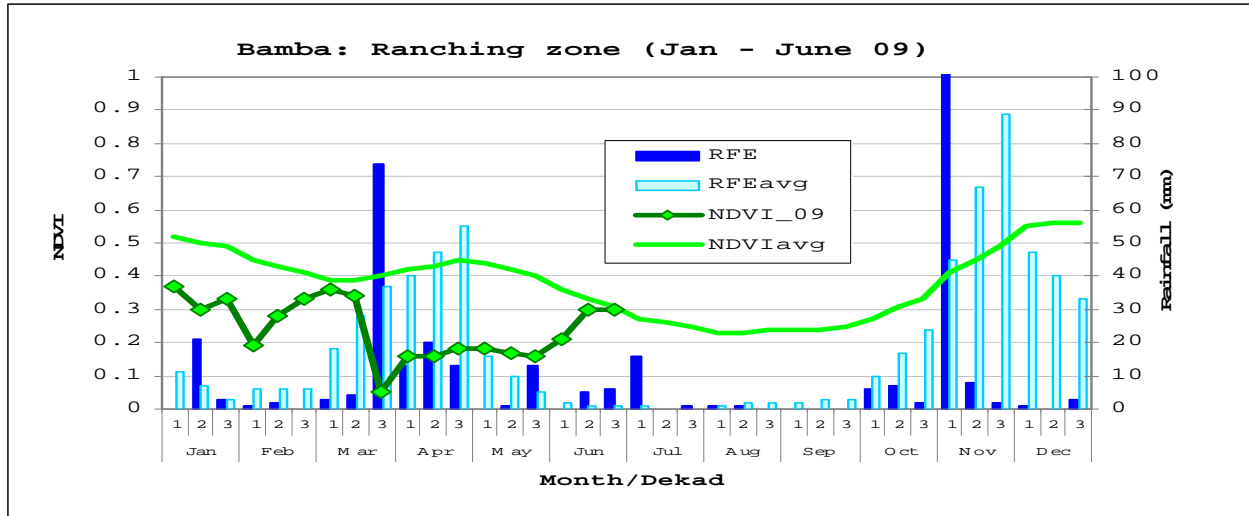


1.2. Condition of natural vegetation and pasture

1.2.1 Quality and quantity

- The condition of natural vegetation and pasture improved slightly as compared last month mainly in areas that received rainfall.

- Availability of the same has been on a downward trend with areas in the ranching and marginal mixed farming livelihood zones adversely affected. This deterioration in pasture resulted in increased conflicts over pasture especially in the ranching livelihood zone.

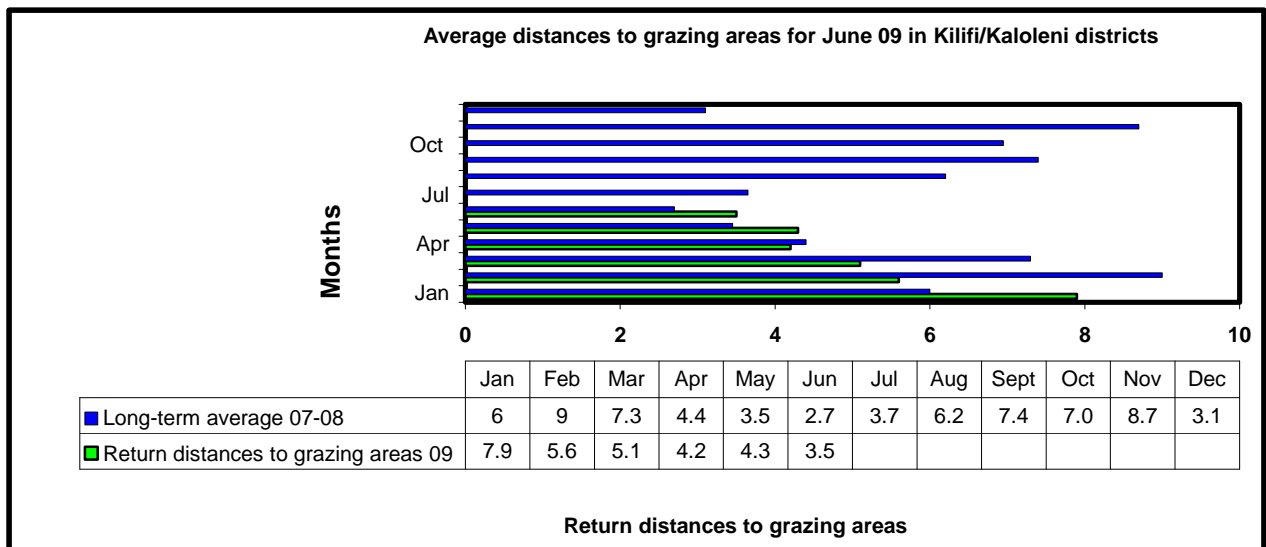


Source: FEWSNET, USGS

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- Areas with scant vegetation were to be found in Gotani, Guru guru and Kayafungo locations in the Kaloleni district.
- Other locations with similarly sparse vegetation were also found in Mnagoni in the ranching livelihood zone and Mwahera, Ndigeria and Mrya Chakwe in Vitengeni division.
- Although browse for the smaller stock continued to be slightly more obtainable than pasture for the large stock.

1.2.2 Distance to grazing areas



N= 360

- Distances to grazing areas did not change much, shifting from 4.3km to 3.5kms in response to the resumption of rains in part of the District.

- Distances were longest in the Ranching and part of the marginal mixed farming zones zone at 6.3 km and shortest in the cash cropping and dairy one at 2.5 km. The long rains are more favorable in the Cash crop and Dairy as opposed to the Ranching zones that do better on the short rains.

1.3 Water sources and availability

1.3.1 Main sources of water

- Approximately half of the population interviewed relied on pans and dams as their main source of water. There was an increase in the number of households relying on these compared to last month as more watering points recharged from run in the current rains. Most of these were to be found primarily in the ranching zone.
- Other water sources included boreholes, natural rivers and shallow wells. These are however, hardly enough as their volumes are fast decreasing due to low recharge and increased human population.
- The lack of water affected school feeding program as many schools cannot cook the food provided due to lack of water.
- This necessitated interventions through water trucking mainly in Kaloleni and Bamba. As more and more water sources dry up hygienic standards in the schools and HHs is compromised as has been the case of Cholera outbreak and increased diarrhea cases.

1.3.2 Household access to water

- Household access to water reduced by 18% from 2.2km in May to 1.8km indicating a general decline in the level of stress at the community level.
- In some areas of the Ranching zone however distances of up to 4km was recorded. This situation is likely to remain the same as the ongoing rains remain erratic.
- The distances were longest in the ranching livelihood zone at 9 km and shortest in the cash cropping and dairy one at 0.5 km.

1.3.3 Livestock access to water

- Livestock access to water continued to deteriorate in June month compared to last month. This was occasioned by the decreasing water sources mainly in the Ranching and Marginal mixed farming in Kilifi and Kaloleni.
- This was especially evident in the Tsangatsini, Kayafungo and Guru guru areas in Kaloleni district where livestock deaths was reported. In Kilifi areas of Mwahera, Mrya Chakwe Mitangani and Ndigiria faced the same challenges.
- The situation was not likely to change until the onset of short rains in early September.

1.3.5 Emerging issues/ conflicts.

- Outbreak of cholera in Bahari and Chonyi divisions has posed a great challenge to HHs given the prevailing water scarcity in the District. Conflicts over pasture as pastoralist make desperate effort to relocate their herds to areas with good pasture and water.
- Human /wildlife conflicts cases reported in Mitangani and Ndigiria where crop damage by Elephants and Buffalo has been reported and one case of human injury. As more water sources dry up the situation is likely to worsen.

1.4. Implication on food security

- The resumption of the long rains in the Cash Cropping and Dairy and the Cropping zones is likely to have a positive impact on the late planted crop as this will enhance maturity.

Improving pasture will equally promote recovery in livestock body condition. However in areas with limited or no rains at the situation is likely to worsen as more water sources dry up. This is likely to further worsen the already negative trend on both livestock and crop production and compromise human health in the affected areas.

2.0 Rural economy indicators (Food availability)

2.1 Livestock production

2.1.1. Livestock body condition

- Livestock body condition remained poor during the reporting period with large stock being the most affected particularly for those in the Ranching zone.
- Livestock keepers in Tsangatsini and Mitangani have had to migrate to other areas in search of pasture to salvage their animals from eminent death. This situation is not likely to let up any time soon given the current weather pattern in the flagged areas.

2.1.2 Livestock diseases

- No major livestock diseases were reported in the month under review.

2.1.3 Milk production

- Milk production improved by 12. % from an average of 6.7 bottles last month to 7.5bottles this month. General livestock production improved in areas of good weather and is likely to continue should this weather persist.

2.2 Crop production

2.2.1 Timeliness and status of crop production

- Most on farm crops are in good development stages following successful failures due to poor weather conditions.
- The acreages are however reduced owing to repeated replanting attempts by HHs. Key on farm crops comprise maize, cassava, Green grams and Cow peas.
- The crops are at different stages of development and likely to give good yields depending on the performance of the current weather.

2.2.2 Pests and diseases

- No major crop diseases or pests of food security concerns were reported during the month.

2.2.3. Crop harvests

- No crop harvests were noted during the reporting period.

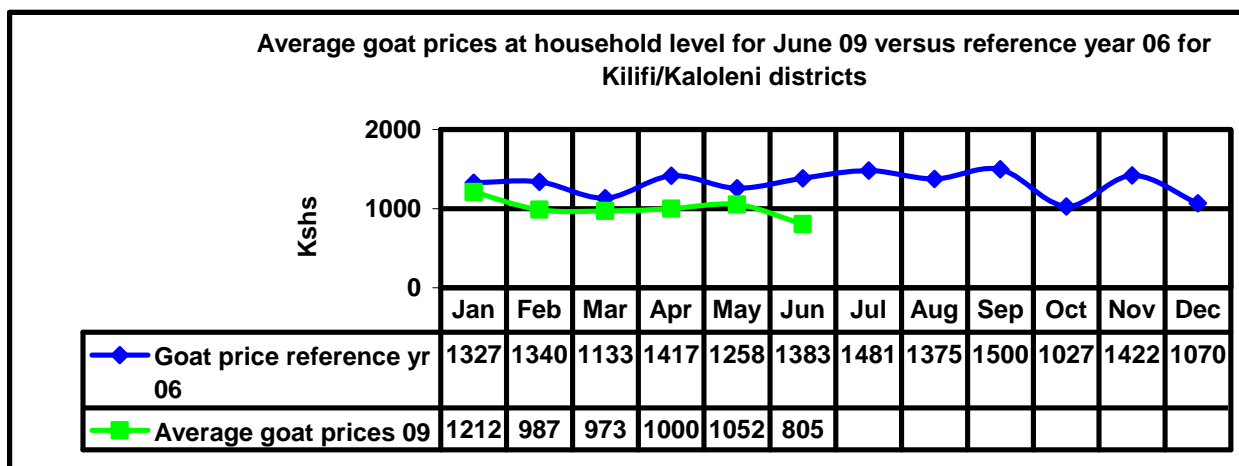
2.3 Implication on food security

- Improving on farm crop development is likely to impact positively on food security, however the reduced acreages will impact food security negatively due over all reduced yield as a result of poor weather condition.
- Equally improving pasture and water access will enhance milk yields in household further improving access to milk dietary diversity and overall food security. However in the flagged areas the food security situation is likely to worsen as poor weather conditions persist.

3.0 Access to food

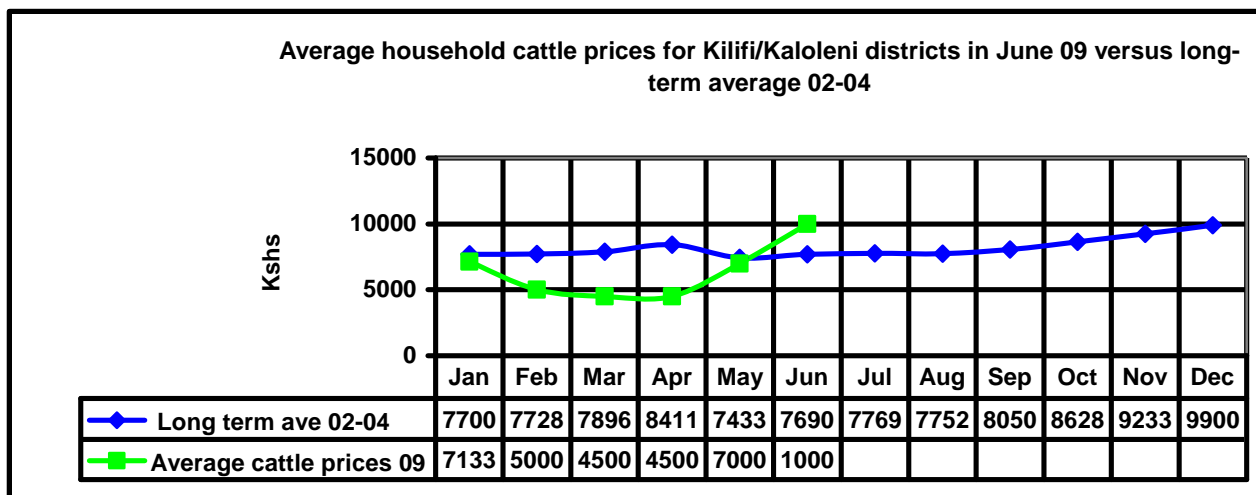
3.1 Livestock marketing

3.1.1 Goat prices



- The retail price for a 3-yr old goat was Ksh805 signaling a 23.5% decline in market price as compared to Kshs 1052 in May.
- The price still remained below the expected long term mean of Ksh1,383 for June.
- Highest goat prices were found in the cash cropping and dairy zone at Ksh1,500 while the least were found in the food cropping livelihood zone at Ksh700.
- Prices are depressed owing to increased livestock disposal in exchange for food stuffs.

3.1.2 Cattle prices



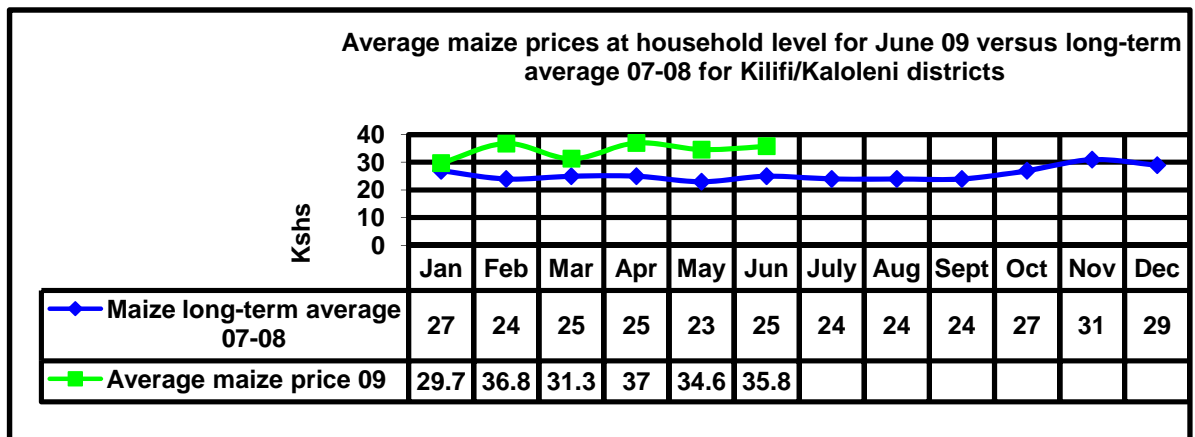
- The average price for a 3-yr old bull rose to Ksh10,000 this month compared to Ksh7000 last month. However, sales were only limited to the high potential zones of the Cash Cropping and Dairy with other LHs registering no sales.
- Although an increase in the price was recorded, the trading price of Ksh10,000 was 42.8% over the expected for this time of the year in comparison to the long-term average 02-04.
- These sales could be for breeding purposes rather than slaughter.

3.2 Milk consumption

- Milk consumption increased from 3.0 bottles in May to 4.3 in June signaling a 43% increase from the sampled population.
- This was mainly owed to the availability of sufficient pasture for livestock due to the current weather. Milk production improved by 12. % from an average of 6.7 bottles last month to 7.5bottles this month.
- General livestock production improved in areas of good weather and is likely to continue should this weather persist.

3.3 Crop prices

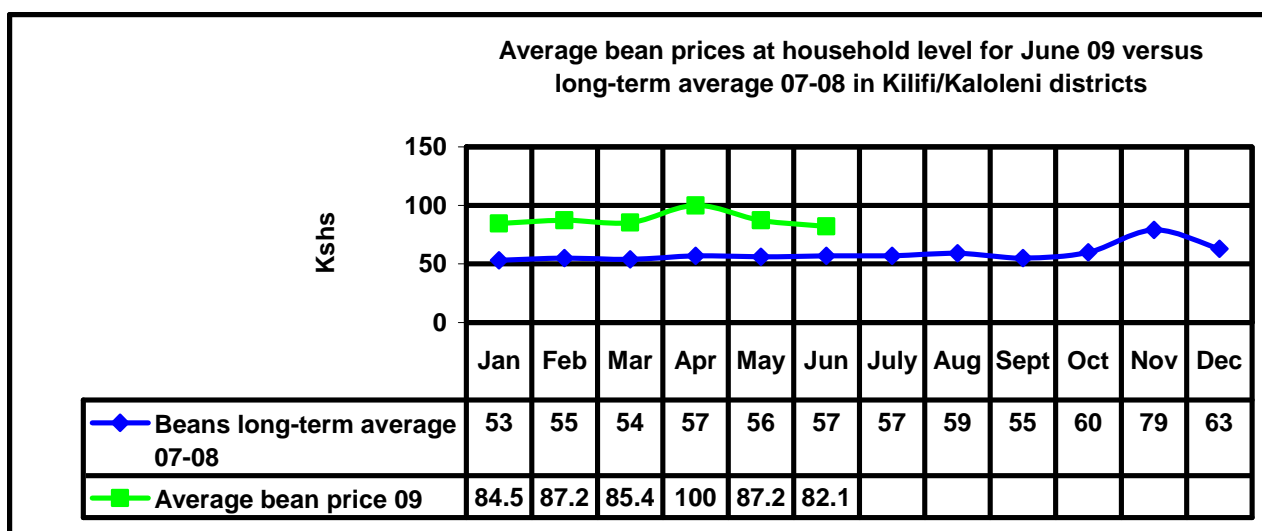
3.3.1 Maize prices



n=11

- Grain prices continued to go up with June recording a 3.4% increase from Ksh34.6 registered last month to Ksh35.8 per Kg in June.
- The prices were much higher than expected in the long-term average 07-08 by 48.2%.
- Households in the two districts have had to contend with the high prices and access to the commodity has been a challenge to many households.

3.3.2 Beans prices



n=12

- The average price for a kilogram of beans was Ksh82.1 this month compared to Ksh87.2 last month. This was indicative of a 5.8% decrease.
- Highest bean prices were recorded in the marginal mixed farming and the Ranching livelihood zones at Ksh100 per kilo while the least prices were found in the cash cropping and dairy one at Ksh60. Beans were generally available across all livelihood zones. They were 44% higher than the expected price of Ksh57 in the long-term average 07-08 for this time of the year.

3.4 Income

3.4.1 Casual labour

- Casual labour was the leading source of income in June supporting about 45% of households. The average daily wage rate dropped from Ksh131.5 in May to Ksh123.5 this month.
- The highest wage rate was recorded in the cash cropping and dairy livelihood zone at Ksh145 while the lowest was in the ranching livelihood zone at Ksh84.

3.4.2 Sale of charcoal

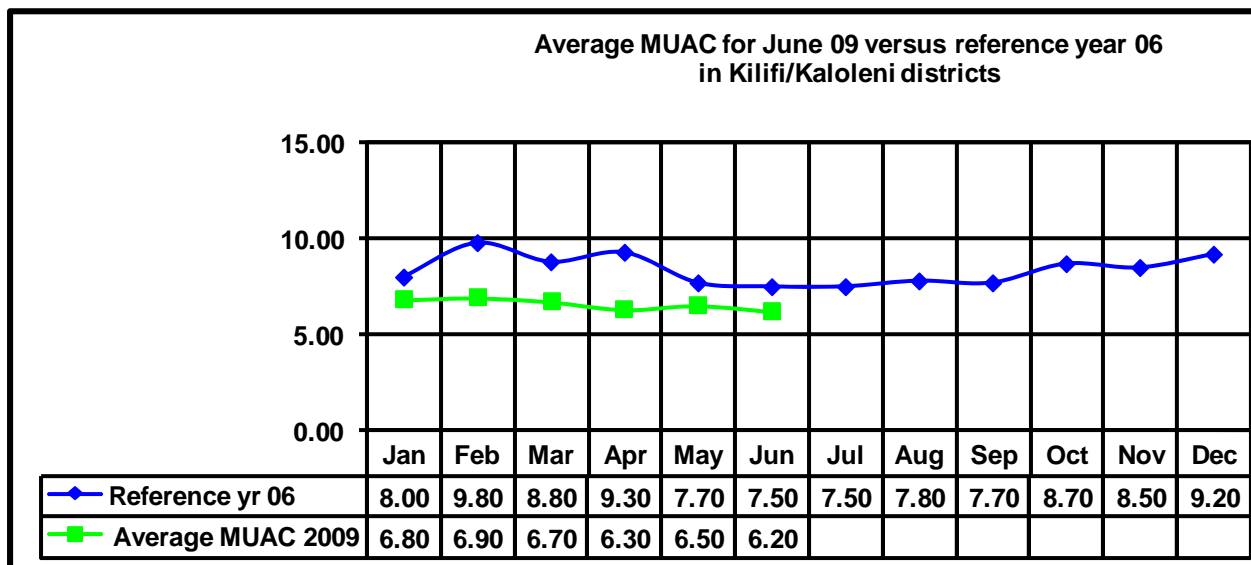
- The sale of charcoal was the second main source of income after the sale of charcoal.
- Income from the sale of charcoal supported many households in the Ranching and Marginal mixed farming livelihood zones and least in the cash cropping and dairy.
- This practice has affected vegetative cover very adversely in the indicated areas compounding the effects of environmental degradation.

3.5 Implications on food security

- An increase in cereal prices and a general decline in livestock prices imply unfair terms of trade thus threatening the very livelihoods that they depend on.
- A reduced wage rate equally implies that households have to engage in more man hours to generate enough income for a simple meal thus making them more vulnerable.

4.0 Human welfare indicators (Utilisation of food)

4.1 Nutrition status



n = 1827

- The percentage of children at risk for malnutrition was 6.2, which was fairly comparable to 6.5 recorded in May.
- The food cropping livelihood zone recorded the highest percentage of children at risk at 9.9 % while the marginal mixed farming recorded the least at 3.1%.
- This was attributed to successive crop failure, limited dietary diversity and utilization rather than access to food.

4.2 Health

- During the month Cholera outbreak was reported in Bahari and Chonyi divisions but the situation has so far been put under control.

5.0 Current interventions

5.1 Food aid

- The Kilifi DC's office distributed 735 bags of in all divisions except Chonyi.
- Food for Assets Distribution targeting expansion of 48 water pans and development of 14 community farms .
- Distribution of Unimix to the under fives by Plan Kenya mainly in Ganze and Vitengeni.
- Screening, vaccination and nutrition support and awareness creation by the ministry of health

5.2 Non-food interventions

The Ministry of youth Affairs has in collaboration with the District forest officer under the Kazi Kwa Vijana program initiated a rigorous tree planting exercise targeting the youth in the dry parts of Bamba Ganze and Vitengeni divisions.

- Under the current phase of EMOP the following interventions are ongoing:-
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 - Provision of equipment to support micro irrigation initiatives at the community level.
 - Water trucking to schools and institutions in Kaloleni and Kilifi.
 - Training of Kilifi District MOH staff on the management of acute malnutrition.
 - Preparation of the Kaloleni District Drought Contingency Plan.

5.3 Other coping strategies

- Normal coping strategies were applied which include reduction of the number and size of meals a day and skipping of food consumption for an entire day.
- However, more severe coping strategies such as increased migrations in search of casual labour and pasture for livestock were also reported.