

Regional Pastoral Livelihoods Resilience Project (RPLRP)

GEODATABASE DEVELOPMENT AND MAPPING OF LIVESTOCK MARKETS AND TRADE ROUTES IN RPLRP CROSS BORDER AREAS ALONG ETHIOPIA-KENYA-UGANDA



Final compiled report

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LIST OF ACRONYMS

CBPP Contagious Bovine Pleuropneumonia.

CCPP Contagious Caprine Pleuropneumonia

FAO Food and Agriculture Organization of the United Nations

FMD Foot and Mouth Disease

GIS Geographical Information System

GPS Global Positioning System

HDX Human Data Exchange

ICPALD IGAD Center for Pastoral Areas and Livestock Development

IGAD Intergovernmental Authority on Development

LSD Lumpy Skin Disease

PPR Peste des petits ruminant.

RPLRP Regional Pastoral Livelihood Resilience Project

RVF Rift Valley Fever

TAD Trans boundary Animal Diseases

UNOCHA Office for the Coordination of Humanitarian Affairs

1.0. INTRODUCTION

Over 60% of the IGAD region landmass is Arid and Semi-Arid Lands (ASALs) dominated by livestock keeping through agro-pastoral and pastoral systems which the main livelihood is earning activity. Livestock are an integral part of the household economy, and contribute significantly to family subsistence, livelihood and well-being.

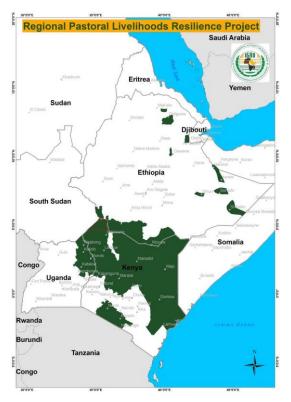
According to United Nation Food and Agricultural Organization (FAO) statistics (FAO, 2012), the IGAD region has one of the highest ruminant livestock concentrations in the world and in Africa. The region is host to 118 million (8%) cattle, 203 million (9.6%) sheep and goats and 14 million (51%) of the camel population in the world.

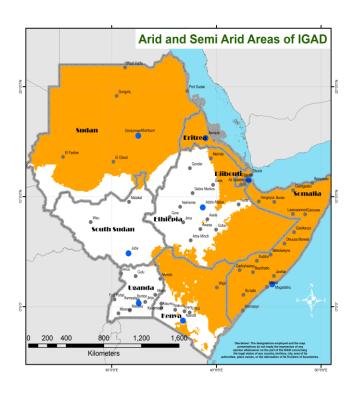
The extent of natural ecosystem, vegetation that support seasonal movement of livestock go beyond national country administrative boundaries. Livestock mobility across these national country borders is inevitable as it's highly dependent on the availability of pasture, water and market for trade. These grazing areas, watering sites and markets may have cross border implication whereby neighboring pastoral community share the limited resources.

The livestock marketing system usually comprise of a series of primary, markets, secondary and terminal markets that are all interlinked together through major and minor trade routes whereby seasonal and cross border mobility plays a key role to both formal and informal livestock trade. Factors such as market infrastructure, nearness to source and destination areas, size of the livestock markets in terms of livestock holdings are some of the features considered in classification of these livestock markets into various livestock types. The trade routes often link up this markets to the source and destination markets that is reliant on the mode of transportation used; truck or by trekking. As it is most cases some of these routes are well defined; along existing road networks that transverse the countries and across national boundaries. There routes are usually well known as they have been used over time by traders linking them with the producers whereas there are instances where some of these routes are not well defined and often are characterized with flow of movement directions.

There are country based initiatives that have spearheaded mapping of these livestock markets and trade routes. However, as it is in most cases, they often than not only reflect individual country status and are not cross border in nature. It is on this basis that a mapping initiative on mapping of livestock markets and trade routes along the borderlines of Ethiopia Kenya and Uganda was initiated by IGAD Center for Pastoral Areas and Livestock Development (ICPALD). This initiative is in support of the Regional Pastoral and Livelihood Resilience Project (RPLRP); a World Bank funded project being implemented in Ethiopia, Kenya and Uganda.

The RPLRP project aims to foster a regional approach in enhancing the livelihood resilience of the predominant pastoral and agro pastoral communities in cross-border drought prone areas of selected countries and improve the capacity of the selected countries' governments to respond promptly and effectively to an eligible crisis or emergency. The project target areas predominantly fall in the ASAL zones as shown in comparative map 1 a &1b.





Map 1a: Map of RPLRP project areas

Map 2b: Map of Arid and semi-arid areas of the IGAD region

The project has five main thematic components; 1) Natural Resource and Management, 2) Market Access and Trade 3) Livelihood Support 4) Pastoral Risk Management 5) Project Management and Institutional Support.

Through application technologies such as Geographical Information System (GIS), mapping of these cross border markets and trade routes can be attained that will reveal their spatial distribution as well as development of geodatabase. Unlike all other existing databases, geodatabases offer solutions in expressing or viewing and storing spatial data with ease. However, which can only be achieved through availability of georeferenced data and harmonization of data across the borderline areas. Consequently, a better understanding on the livestock marketing system in the cross border areas can be achieved.

Access and sharing of existing data/information from the stakeholders on livestock markets and routes and supporting data such as attribute information on volumes of livestock traded per species, market infrastructure status, facilities and services available seasonal pricing, etc. formed the basis of the mapping initiative. As it is in most cases, data may exist within respective countries either from documented secondary sources or through previous projects done by the line ministries, non-governmental organizations /agencies, research institutions. This was supported with mobile data collection technology in collection of onsite georeferenced field data.

2.0. OBJECTIVES

The overall objective of the project was to map and develop a geodatabase of livestock markets and trade routes within cross border areas along Kenya- Uganda-Ethiopia-border within the RPLRP project areas; cluster 1, 2 and 3. Whereas the specific objectives were;

- a. To collect and catalogue available data on livestock markets, animal health infrastructure and livestock routes, and complimentary data on relative pricing, volume of trade.
- b. To access the current livestock market infrastructure status
- c. To perform a data gap analysis of collected data on livestock markets and routes.
- d. To catalogue develop maps on livestock trade routes and markets.
- e. To develop geodatabase of livestock markets and trade routes.

3.0. SCOPE OF STUDY

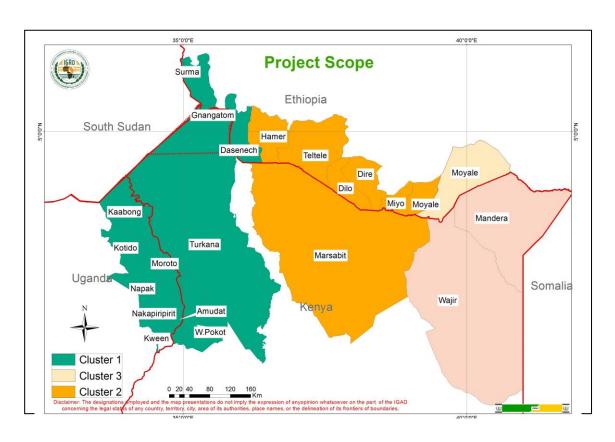
The mapping initiative was one of the baseline studies conducted in support of market access and trade component; IGAD RPLRP project, component 2 sub-component 2.1 and output 1 of the project. The initiative will not only support the participating countries in mapping out the existing livestock markets and trade routes but also provide insights on the current regional livestock market infrastructure.

The RPLRP cross border areas comprised of 24 woreda/county/districts that constitute the cross border areas along Ethiopia-Kenya-Uganda national borders as summarized in table 3 and as shown in map 3.

These cross border areas of intervention are generally referred to as project clusters; RPLRP cluster 1 area comprises of the cross border county/woredas/districts along Ethiopia, Kenya and Uganda whereas RPLRP cluster 2 and 3 comprises of the cross border county/ woredas along Ethiopia and Kenya border

Country	Woreda/District/County
Ethiopia	Surma, Gnangatom, Dasenech and Hamer (South Omo Zone); Miyo, Dire, Dilo, Yabelo, Teltele (Borena Zone); Moyale (part of Borena and Dawa zone)
Kenya	Turkana, West Pokot, Marsabit, Wajir and Mandera
Uganda	Kaabong, Moroto, Kotido, Nakapiripirit, Napak, Amudat and Kween

Table 3: Cross border areas along Ethiopia-Kenya-Uganda border



Map 3: Map of RPLRP cross border areas highlighting the three clusters

4.0. METHODOLOGY

4.1. Data collection

As part of the implementation plan, a two phase approach was adopted for data collection phase that set precedence to development of data catalogue, maps that depict the spatial distribution of livestock markets and routes and geodatabase containing spatial referenced data of the project area.

a. Data assessment

Cognizant of the need to involve all stakeholders' right from the inception of the project, courtesy calls, discussions and interaction with stakeholders as well as pastoral communities was key. The study was carried out through gathering of secondary data and field visits during which discussions were held with line ministries, local government and administration, RPLRP Country Coordination Units, local pastoral communities and NGOs operating in respective

areas. Throughout these sessions, various methods that were used in data collection included key informant interviews, use of standardized data checklist as shown in annex 1.

The discussions focused on the general overview and review of status of existing secondary data/information on livestock market and routes.

b. Field work/site visits

The field data collection and onsite visits was conducted alongside the data assessment. During these visits, Global Positioning System (GPS) coordinates of accessible livestock markets were captured using android mobile application GPS essentials. In instances where accessibility was a challenge, the RPLRP regional and district/woreda/county coordinators assisted in the data collection exercise. In addition, they also provided for necessary translation services in places where language and communication was a barrier.

Geotagged and descriptive photos of the current market infrastructure was also captured. This provided for inputs for informed visual assessment on the infrastructure status that would inform on investment decisions within the project.

Data on the relative pricing, seasonal volume of trade, trade routes or market linkages was conveyed through various session of key informant interviews with the pastoral communities, livestock traders, line ministries, livestock market association members and brokers. Engagement with these stakeholders provided a broader understanding on the livestock marketing and trade system in terms of source, destination areas, livestock routes, cross border linkages as well as the challenges, opportunities therein. It further promoted participatory mapping of the livestock trade routes and location of markets as identification and location of these markets both in existence and proposed and their linkages was done by the community themselves. This encouraged community engagement in the whole data collection process as shown in plate 4.1a-d.



Plate 4.1a: Community meeting, West Pokot, Kenya



Plate 4.1b: Participatory mapping in Marsabit, Kenya





Plate 4.1c: Community meeting in Gnangatom, Ethiopia

Plate 4.1d: Stakeholder engagement in Uganda

The entire data collection exercise was conducted in phases based on the three RPLRP clusters that run through for September 2015- June 2016.

4.2. Data handling and management

Notes were taken during interviews and some of the data were analyzed as it was being gathered. Spatial data also shared by various stakeholders/ reviewed during was also collated and harmonized with the field data collected. For instance; Collation of data from the field, stakeholders' engagement and recent study conducted in 2014 by GIZ "Enhancing Drought Resilience in Northern Kenya by Strengthening Livestock and Livestock Product Markets in Turkana and Marsabit Counties, identified livestock markets in the cross border area. Other supporting base data form various database repositories such as UNOCHA HDX, FAO, Open street map, GIZ and other online databases were included and harmonized.

The spatial analyses was done using ArcGIS 10.1 software for development of spatial entities and maps as well as the geodatabase.

The mapping project was coordinated by the GIS and Remote sensing Unit at ICPALD.

5.0. MISSION FINDINGS

The mapping project was done in phases based on the 3 RPLRP clusters that spread along the borderline along Kenya-Ethiopia-Uganda border. The discussions will be based on distribution

of livestock markets, market infrastructure status, livestock trade and market actors and challenges in relation to livestock marketing and trade.

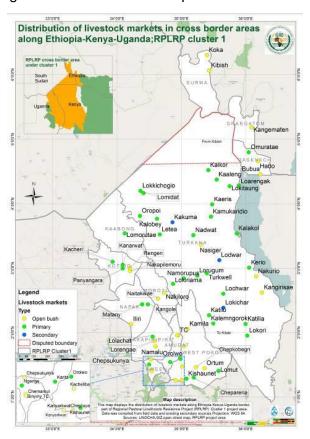
5.1. Livestock markets distribution

General outlook

A total of 189 livestock markets were identified and mapped with most of which are open bush, primary or secondary markets. Out of these, Ethiopia has 24, Kenya has 144 while Uganda has 21. The current status is that in Ethiopia: Of the 24 markets; 54% are open bush, 8% are primary while 38% are secondary; in Kenya: Of the 144 markets; 51% are open bush, 38% are primary while 11% are secondary and in Uganda: Of the 21 markets; 57% are open bush while 43% are primary. There are no secondary cross-border markets.

5.1.1. Livestock markets distribution in RPLRP cluster 1

A total of 68 livestock markets were identified and mapped based on their type; 37 are primary markets accounting to 54.4% of total, 3 are secondary accounting to 4.4% of the total and 28 are open bush market accounting for 41.2% of the total. The spatial distribution of these markets and the percentage are as shown in the map 5.1.1



Map 5.1.1: Livestock markets distribution map in RPLRP cluster 1

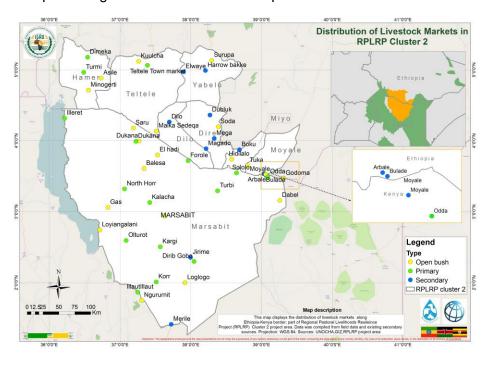
A majority of the livestock markets identified were both open bush markets and primary markets.

- The open bush markets were; Binyiny TC, Chemamul, Chepsukunya, Lorengae, Namalu, Amudat town council, Camel market, Panyangara, Nakapilemoru, Naitakwae, Nakiloro, Iliri, Nasiger, Nakurio, Kangirisae, Kamila, Konyao, Cheptuya, Kanyarkwat, Chepkobegn, Ortum, Kacheliba, Kangematen, Bubua, Kibish, Hado, Koka and Acobo.
- The primary markets identified were; Ngenge, Lolachat, Karita, Kanarwat, Kacheri, Rengen, Lomorutae, Kangole, Matany, Nadwat, Kalobey, Oropoi, Lokkichogio, Lomidat, Letea, Lokiriama, Namorupus, Kalemngorok, Lorugum, Turkwell, Kerio, Katilia, Lokori, Katilu, Lochwar, Kalakol, Kaikor, Kaaleng, Lokitaung, Loarengak, Kaeris, Kamukaridio, Orolwo, Lomut, Chepareria, Kishaunet and Omuratae

The secondary markets identified were; Kakuma, Lokichar and Lodwar. A detailed summary of livestock markets as described in annex 2.

5.1.2. Livestock markets distribution in RPLRP cluster 2

A total of 46 livestock markets were identified in the cross border area. Secondary markets were 12 (26.1% of total), primary markets were 15 (32.6% of the total) and open bush markets were 19 (41.3% of total). The data was collated form the field in addition to data collated from a study conducted in 2014 by GIZ "Enhancing Drought Resilience in Northern Kenya by Strengthening Livestock and Livestock Product Markets in Turkana and Marsabit Counties. This contributed to collation of data of the inaccessible areas. The spatial distribution of these markets and the percentage are as shown in the map 5.1.2



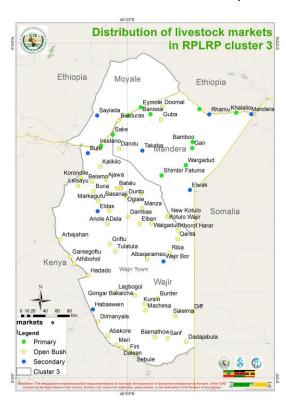
Map 5.1.2: Map of distribution of livestock markets in RPLRP cluster 2

- The Secondary markets identified were; Moyale, Jirime, Bulade, Arbale, Boku, Dubluq, Magado, Mega, Dilo, Elwaye, Harrowbake and Merile.
- Primary markets identified were; North Horr, Kalacha, Forole, Illaut, Dukana, Turbi,
 Korr, Olturot, Kargi, Odda, Dirib Gobo, Forole, Sololo Teltele Town and Odda,
- Open bush markets identified were; Dukana, Moyale goat market, Kargi, Maikona, Loglogo, Gas, Loyiangalani, Ngurunit, Godoma, Balesa, Dobel. Surupa, Soda, Malka sadeqa, Hidilao, Tuka, Saru, Debagaya, Kuulcha,

A majority of the livestock markets were primary markets that act as feeder markets all located in Marsabit County. Whereas, secondary markets, a majority were located in Ethiopian woredas with only two in Marsabit county. A detailed summary of livestock markets is as described in annex 2

5.1.3. Livestock markets distribution in RPLRP cluster 3

A total of 73 livestock markets were identified and mapped based on their type; 14 were primary (19.2%) 8 secondary markets (1.1% of total) and 52 and open bush market (71.2% of total). The spatial distribution of these markets is as shown in the map 5.1.3



Map 5.1.3: Distribution of livestock markets in RPLRP cluster 3

A majority of the livestock markets were open bush markets located in Wajir County. Whereas, secondary markets, a majority were located in Kenya in Mandera County and one in Ethiopia in Moyale woreda Oromia region while primary markets are all located in Kenya in Mandera county.

- The primary markets identified were; Burmayow, Omar Jilo, Olla, Hareri, Sala, Kutolu Mandera, Kilwehiri, Damasa, Arabia, Khalalio, Wargadud, Warankara, Fino and Elwak
- Secondary markets identified were; Takaba, Mandera town, Banisa, Rhamu, Lafey, Ashabito, Bute and Eldas.
- Open bush markets are; Albaqeramso, Wajir Bor, Riba, Qarsa, Khorof Harar, Khorof Harar Proposed, Kotulo, New Kotulo, Walgadud, Elben, Dambas, Manza, Oglale, Dunto, Basanaji, Basanaji Camel market, Batalu, Ajawa, Kalikilo, Korondile Market, Leisayu, Belamo Village, Buna, Markagufu, Anole B, Dela, Gongar, Bakalcha, Kursin, Machesa, Burder, Diff, Salelma, Dadajabula, Sarif, Biamathow, Sebule, Fini, Dalsan, Meri, Abakore, Dilmanyale, Habaswein, Lagbogol, Hadado, Athibohol, Garsegoftu, Arbajahan, Griftu and Tulatula.

A detailed summary of livestock markets is as described in annex 2.

5.2. Livestock market infrastructure

The open bush markets were characterized as having none or limited market infrastructure. These were scattered across the borders of the three countries. The primary markets were characterized to have some basic infrastructure in place but requires repair or upgrading. These markets serve as common trading centers that will eventually feed into the secondary markets. Whereas, the secondary markets were generally characterized as to having infrastructure in good condition but require maintenance. They serve as a link to other terminal markets (tertiary or export).

5.2.1. Livestock market infrastructure in RPLRP cluster 1

With the existence of all the livestock market types, a majority of the livestock markets across the cluster were open bush markets. The producers and traders interact in these markets where brokers play an active role in determination of price of livestock to be traded. Most of these open bush markets are usually located near reliable water sources, grazing area river beds, nearby town centers and producer areas.



Kanagmaten, Gnangatom, Ethiopia



Binyiny TC, Kween, Uganda

A general observation was made that most of the primary markets had limited market infrastructure such as sale yard, fencing, and loading ramp. The structures in place however require repair/ upgrading. These markets are usually located in or near market centres and are fed from the open bush markets.





Example of primary market: Oropoi in Turkana County

The market infrastructure design and layout for the secondary livestock markets in Kenya (Kakuma, Lodwar and Lokichar) and current infrastructure status is good. However, it requires general maintenance. There were no secondary markets in Uganda. The secondary markets identified had water pipeline connectivity issues in that the troughs had pipes that were not connected to any water source. The existing water sources were tanks which were limited in capacity to supply enough water for the markets.





Example of secondary market: Lokichoggio, Turkana County

It was observed that there is coexistence of trade of livestock with that of commodities whereby the sale yard and commodity structures are portioned and are located in one place. For the structured markets, this was influenced by the design of the market. In some of the open bush markets in Ethiopia, a sack of maize could be traded for a goat





Asile bush market

Nakiloro market, Moroto

It was noted during the study that all markets lacked incinerators and those with existing weight balances were non-functional.

In absence of the market structures, there was good will of the pastoral community in identification of sites for market construction to support the trade. In addition, efforts are been made either to upgrade or to repair existing ones by the governments in collaboration with development partners.

There was presence of slaughterhouses in some of the districts visited such as Nakapiriirit, Moroto and Napak. However, their infrastructure condition should be improved. A summary of livestock markets in terms of their infrastructure status is as shown in annex 3.

5.2.2. Livestock market infrastructure in RPLRP cluster 2

A general observation was made on that most of the primary markets have infrastructure in place but require repair/ upgrading.

The market infrastructure in markets in design and layout for all the secondary livestock markets in Ethiopia is replicated in all the livestock markets visited and current infrastructure status is good. This status of the current status did not differ from market to market.

A common observation made was that they lack permanent sheds structures and lack of water

pipeline connectivity to supply the water troughs with water. The existing water sources were tanks which were limited in capacity to supply enough water for the market.

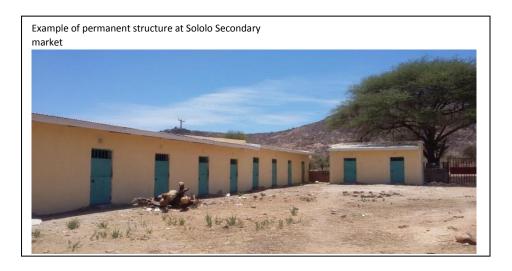


The open bush markets on the other hand were located near reliable water sources, river beds, in town centres characterised with no market structure. However, there are active de of small stock; shoats. It was noted that the pastoralist prefer to trade of their livestock away from the established markets similar situation as that of cluster 1.





Moyale small stock market located in the town



It was noted that with the current livestock market infrastructure, efforts are been made either to upgrade or to repair existing ones by the governments in collaboration with development partners. For instance, the construction of modern market in Merile by USAID.

It was noted that there some livestock market with infrastructure but not functional or minimally used either due to the market not being officially opened or due to poor siting of the market whereby the traders prefer to sell of their livestock in the open bush markets nearby towns/ open bush markets. For example, Sololo market is partially been used to load livestock due to the presence of loading ramps even though it has not been officially handed over to the community. North Horr had not been operational since 2008 however sales are done outside the market and there exist an oasis that serves as a

permanent source of water. Kalacha that is also non-functional due to the lack of grazing fields around the market and Boku in Miyo woredas in Ethiopia.

All markets lacked incinerators and those with existing weight balances were non-functional. For instance, Moyale and Jirime both in Marsabit County. Traders have adopted creative means of weighing by fixing portable scales within the livestock markets or in the bush markets on trees. This is attributed to the preferred sale of small stock based on live weight as influenced by Ethiopian traders. There were no holding grounds observed. It was noted previously in Moyale Woredas in Ethiopia there were holding grounds constructed by third livestock development project (SORDU-Southern Rangeland Development Unit) however, there are not operational.

The effects of conflict have led to non-functionality of some of the markets as the infrastructure were vandalised. For instance, in Moyale and Odda livestock markets both in Marsabit County; the previous tribal conflicts amongst the communities have led to vandalization of the market infrastructure such as weighing scales, fencing. This has favoured trade to Ethiopia where there are thriving markets on the cross border town of Moyale in Ethiopia.

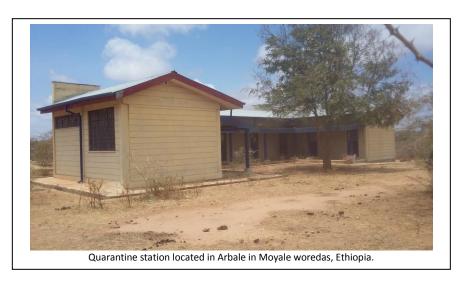


A unique situation was observed and noted along Marsabit and Samburu county border in Kenya whereby, there exist two livestock markets in close proximity (across the main road) on either side of the border with distinct difference in infrastructure- Illaut town. Illaut livestock market on Samburu County is recently constructed with permanent infrastructure as compared to Illaut in Marsabit County where there is more active trade.

It was also noted that in relatively major towns such as Moyale woreda in Ethiopia there are slaughterhouses with permanent structures which may benefit the pastoralist and traders during the drought and natural hazards incidences for live animals and also provide market for hide and skin.



It was observed during the study that there is a quarantine station located in Arbale in close proximity to the livestock market. The station however, provides inspection service for crop products rather than livestock products and yet livestock it's the main stay of the area.



A summary of market infrastructure is as shown in annex 4.

5.2.3. Livestock market infrastructure in RPLRP cluster 3

A general observation was made on that most of the secondary markets have infrastructure in place but require repair/ upgrading as well as the primary markets that have less infrastructure in place that require repair and upgrading as well.

The open bush markets are usually located near reliable water sources, river beds, in town centres characterised with no market structure. However, there are active to trade of small stock; shoats.

Most livestock markets lacked shelters leading to some markets using local materials for the shades. Majority of all secondary markets in Mandera had shelters unlike the primary markets in Mandera which lacked shelters. A functioning loading ramp was observed in Khalalio and Mandera livestock market.

It was also noted that some of the secondary markets in Mandera lacked basic infrastructure like sale yards, holding grounds and shelter for the livestock and are forced to do livestock trading in the open, under trees.





Livestock sale under a tree in Banissa'

Bush Market site at Doomal-Banissa Sub-County.

It was noted that there was a holding ground in Mandera livestock market in Mandera Country in good condition as shown below.



Holding ground -Mandera livestock market

Most of the secondary markets had a variety of market infrastructure inclusive of structures such water truff, water tank fence, loading ramp, shelters, offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator as sale yard, fencing, and loading ramp. The structures in place are in good condition but require repair. For instance, it was observed that there was lack of water pipeline connectivity to supply the water troughs with water. The existing water troughs were in poor condition and require renovation as well as an upgrade in water pipeline connectivity to supply enough water to the water troughs in the livestock market.



Water trough in poor condition which lack water piping connectivity-Rhamu

A summary of market infrastructure is as shown in annex 5.

5.3. Livestock trade and market actors

The cross border woredas along Kenya-Ethiopia-Uganda border are heavily reliant on livestock as their source of livelihood. There is active both formal and informal cross border trade and linkages with markets situated along the border whereby the common livestock type traded are cattle, sheep, goats and camel. There is relatively high presence of informal livestock trade. All livestock types are traded in the livestock markets. However there is a higher preference for small stock livestock. The spatial distribution of the livestock trade routes and markets for each of the three clusters is as shown in maps 5.3 a and b and detailed breakdown of the routes is as shown in annex 4.

Livestock are either trekked or trucked to destination livestock markets located in major towns or for export in volumes. However, there is lack of standardized transportation system; use of pick up and "isuzu trucks". In instances of trekking, the livestock are trekked over long distances due to the location of some of the markets.



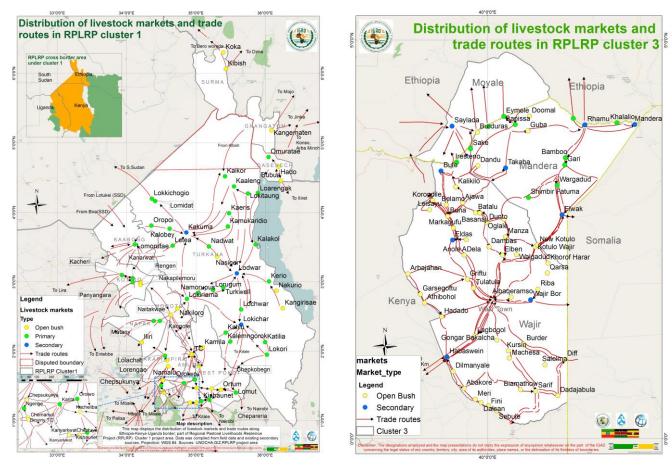


The common mode of transaction is cash based with limited mobile money services in the three countries. The use of Mpesa is for mobile money transfer is commonly being used in Kenya. For financial service provision in Ethiopia, livestock markets especially those in cluster 2 depend on the banks located in the towns as there are no microfinance's, saccos or money transfer services within the livestock markets or in close proximity. For instance Dilo secondary livestock market that relies on the bank at Yabelo 100km away.

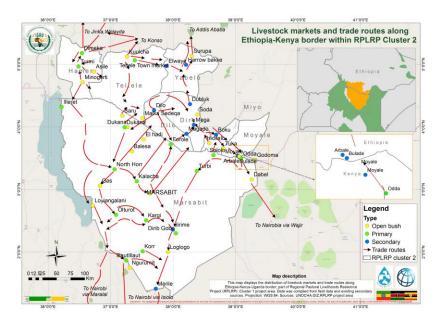
In Ethiopia, there is preference of live weight based system of trade and it was observed for woredas bordering Turkana (Gnangatom and Dasenech) barter trade system is still practiced (exchange of shoats to a bag of maize).

The buyers of live animals; butchers, local petty traders, national traders (feedlots), export traders, brokers. The price of livestock significantly from season to season following national/ religious holidays.

Brokers play a significant role in price limitation, depriving negotiation power between the producers and the traders. To some extent they go to the villages and collect and gather the livestock from the pastoralist.



1,2&3



Map 5.3a: Map of livestock trade routes and markets in cluster 1,2 & 3

A summary of livestock trade routes is as shown in annex 6

5.4. Challenges to livestock trade and marketing.

Based on the mission findings, field assessment and interaction with the various stakeholders involved during the project, the following were posed as the major challenges facing livestock marketing and trade in all the three clusters

- a. High prevalence of Trans boundary animal diseases (TADS); PPR, FMD, CCPP, CBPP and RVF. It was noted that vaccination programs are being carried out in the three countries; Kenya and Ethiopia and Uganda however, there is limited harmonization of vaccination. The occurrence of disease is factored by the high mobility.
- b. Prevailing drought occurrence. The prevailing nature of drought occurrence has an implication to availability of pasture and water for which the pastoralist heavily depend on for their livestock survival and also for their survival. The existing water sources are few and even those available are not fully operational.
- c. Bush encroachment and land degradation. The palatable grass species are being replaced by unpalatable grass and bushes such as prosopis.
- d. There is limited appropriate extension system for pastoral areas in support of breeding programs. This had led to dilution of preexisting breed types.
- There lacks a standardized transportation trucks for all livestock types as well as high transport cost to terminal market that directly affect the pricing of the animals.
- f. Adverse influence of brokers especially in price limitation makes the pastoralist (producers) not to fully benefit from the thriving livestock trade.
- g. Poor livestock market infrastructure and underutilization of market structures.
- h. Drug smuggling practice, from Somalia and Kenya through informal traders has an implication on disease control in the area due to imports of substandard drugs in the market.
- i. Low market prices attributed by insecurity in Middle East (Yemen).
- j. Lack of border inspection points.
- k. Informal livestock marketing due to lack of appropriate livestock infrastructure.
- I. Prevalent tribal conflicts that have an effect on conducive environment for trade.
- m. Limited presence of market monitors or associations in most of the markets
- n. Under-utilization of the market infrastructures in some cases with poor siting as sited as one of the major contributing factors.

- o. Lack or limited livestock market infrastructure as it most cases the majority of the markets are open bush markets.
- p. Lack of mobile networks in some markets that has an impendent of reliable communication.

6.0. CONCLUSIONS AND RECOMMENDATIONS

The mapping of livestock markets and trade routes as well as complimentary data such as; relative pricing, seasonal volume of trade was successfully completed for the entire RPLRP cross border areas along Kenya Ethiopia Uganda border. This set precedence to development of geodatabase. As part of the validation process, the mission findings, maps, catalogs, geodatabases for the respective three countries were presented and validated by the respective RPLRP participating countries.

An online web platform was then developed in form of story map with the aim of complimenting the harmonized cross border data which can be accessed via the URL: https://www.arcgis.com/apps/MapJournal/index.html?appid=dbf3d8b494f243e5b2595c5 7ce96136a

The study/mapping project drew the following as conclusion and recommendations;

- The project notes that there is need for strengthened and improved cross border trade between Kenya, Uganda and Ethiopia due to the high potential it has. Informal livestock trade in the cross border as traders and producers exchange their livestock and their mode of movement is trekking. The existing livestock trade routes whereby trucks are being used are limited in terms of accessibility because of unreliable road infrastructure. Potential of some of the catchment areas remain untapped. Thus, improvement of current rod infrastructure could lead to formalisation of livestock trade.
- Generally, the current market infrastructure of the existing livestock markets visited require general repair. This will further enhance the existing thriving livestock trade.
- A majority of secondary markets located in Ethiopia, However, depending on the transaction volumes and the demand they may be a need to construct primary markets in the kabelles that will feed to the existing secondary markets as most of the latter are usually located in the towns posing a challenge to pastoralist who have to travel for longer distances to reach to the markets. This necessitates the need for proper siting of livestock markets in a consultative process and approach involving all relevant stakeholders. For instance, In order to enhance the existing livestock trade, it was proposed that construction and establishment of livestock markets should be done at Negele and Yabello.

- Even though the livestock market association exist in most markets especially in Marsabit County, they presence is weak. This poses challenges in providing linkages between traders and producers. Streamlining of wholesome data collection on livestock markets can contribute to strengthening of existing livestock information systems or their establishment. It is proposed that through strengthening of livestock marketing associations (LMA), collection of reliable livestock market data can be attained.
- There is potentiality in value addition products such as Milk value chain, hides and skin, bone and horn making. However due to lack of proper arrangement, financial support and infrastructure, it still remains a challenge.
- High prevalence of trans boundary animal diseases (TADS); PPR, FMD, CCPP, CBPP and RVF. It was noted that vaccination programs are being carried out in both countries; Kenya, Uganda and Ethiopia, however they lack harmonization which facilitates the reported occurrence of disease outbreak in either countries.
- Brokers play a significant role in price limitation, depriving negotiation power between the producers and the traders. It is proposed that new livestock and trade proclamation in Ethiopia for instance has to be enforced so as to benefit the array of market actors present particularly the producers.
- Livestock market information is usually collected by the respective offices
 ,drought resilience initiatives, NGOS/ development partners but there is a gap in
 dissemination to the producers thus a market information system should be
 strengthened to reach the producers.
- Despite the fact that the traditional water points are far from the market there is however a need to rehabilitate ellas and ponds to sustain the productivity of livestock destined to markets.
- Mobilization and sensitization of both traders and producers on livestock trade days can be improved through use of media for propagation of information by use of local radio stations such as SIFA and STAR FM as it was observed that only local traders will have knowledge of the market days but cross border ones may not be aware of them especially for the markets away from the border.
- With the ongoing expansion and upgrading of road infrastructure, both the
 producers (pastoralist) and traders are preferring trucking instead of trekking
 therefore, it imperative to support in availing standard transportation trucks for
 cattle, camel and shoats as the trucks they use are not standardized. This could
 also inform on formalized livestock trade routes within the cross border area.

- There is a potential in advocacy of livestock insurance to cover losses occasioned by drought and insecurity.
- There is immense potential for promotion of pasture/fodder production and conservation.
- As part of formalization if trade and control of TAD, it is proposed that Investment in border control post can be an added advantage.
- The current market infrastructure of the existing livestock markets visited require general repair hence an investment opportunity for upgrading/ repair. This will further enhance the existing thriving livestock trade.
- The study proposed that through fixing market days in some markets to boost trade volumes. It was observed that only local traders will have knowledge of the market days but cross border ones may not be aware of them especially for the markets away from the border. Livestock trade days can be improved through use of media for propagation of information by use of local radio stations.
- Community sensitization in better natural resource management. Successful
 community outreach requires consistent messages repeated in a wide variety of
 materials and reinforced by interpersonal contact as well as via mass and local
 media channels. Importance of natural resource management should therefore
 be shared with the community through mass or local media channels or stations,
 as well as community engagement in workshops that emphasize on importance
 natural resources management for effective management of natural resources.
- The study proposed that investment should be made in conflict resolution mechanisms.

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ANNEX 1: DATA CHECKLIST

Regional Pastoral Livelihoods Resilience Project (RPLRP)

Data Checklist for Cross-border livestock markets and routes mapping

Section A: Livestock Markets

Any other comment

Section A details the information on the livestock markets while section B details on livestock routes.

Section A1: General Information (This section aims at collecting information on the location of livestock markets)

General Information					
Name of the market:				Code:	(filled in office)
Market Location:	UTM_	X coord/Lat:		UTM_Ycoord/Long	
Country					
Region/					
Woreda/county/district:		Sub county/division/Kabele:			
Type of market	1. Pr	imary 2. Seconda	ary 3. Bor	der inspection point	
Livestock Source areas:	1.	Locally (Only reside	ent)	2. Neighboring country	3. Both
If neighboring Countries, Name the cou	untries				
How the market is used by neighboring	g country? 1	. Permanent 2. Du	uring transhu	umance 3. Both	
Destination area/markets:	1. Lo	cal/ in country 2. N	leighboring	3. Both	
Name the destination markets:					
livestock markets) List of infrastructure		Yes or No		Remark about the sit	uation
1. shelters		res or No		Remark about the sit	uation
Loading ramps					
3. Fencing					
4. Watering points/truffs					
5. Feeding points/truffs					
6. Store(feed and others)					
7. Clinics					
8. Isolation area					
9. Incinerator					
10. Other (specify)					
Other Services (e.g money transfer)					
1. Banks					
2. Microfinance					
Other money transfer service					
Section A3: Market actors (This section	า aims at co	llecting information	n on the mai	rket actors)	
1. Who are the main suppliers?	1. Pastorali	st/farmer 2. Trade	rs 3. Both	4. Other (specify)	
2. Who are the main buyers?		•	viders 3. Lo	cal petty traders	
4. National traders 5, export					
3. Are there prominent brokers	/middle per	son? 1. Yes 2. No)		
If yes, specify their role					
4. Others actors (specify)					
If yes, specify their role					

Section A4: Trade volume

This section aims at collating information on livestock trading associated with the market In terms of volume on livestock traded, pricing and market linkages to other livestock markets.

Species	Peak season Months: months)	(specify the	Normal sea Months: (specify the		Low seaso Months: (specify the	on ne months)
	2014	2015	2014	2015	2014	2015
Cattle						
Sheep						
Goat						
Camel						
Equines (donkeys/mule)						
Others (specify)						

Section A5: Relative livestock pricing (if available)

This section aims at collating information on the average relative prices of livestock during the high, normal and peak season in the respective livestock markets.

	Relative Pricing of livestock												
	Species		eason y month	ıs:			al Seasor y month			Low Se Specify	eason y months	:	
			2014 2015		2014		2015		2014		2015		
		M	F	М	F	М	F	М	F	М	F	М	F
Goat	Mature												
	Immature												
	Young												
Sheep	Mature												
	Immature												
	Young												
Cattle	Mature												
	Immature												
	Young												
Camel	Mature												
	Immature												
	Young												

Others							
Comments							

Section B: Livestock trade routes

This section aims at collecting the gathering information of the livestock routes and provides for linkages to other surrounding livestock markets. *AHP= Animal health post

Name of Livestock	Main	Destination	Mode of	Average	Time taken	Infrastructures along the rou		ne route
route	market		transport	distance to	to reach	Holding	AHP*	Watering
(Sources			destination	destination	grounds	available?	point
trucking/trekking)	of						(Yes/No)	available
	livestock							Yes/No

Sketch of livestock market in connection with the routes and interlinking markets

ANNEX 2. CATALOGUE OF CROSS BORDER LIVESTOCK MARKETS

Country code	Name	Latitude	Longitude	Area	Туре	Cluster
UGA	Binyiny TC	1.41878	34.534813	Kween	Open bush	1
UGA	Chemamul	1.401126	34.540485	Kween	Open bush	1
UGA	Ngenge	1.502917	34.498459	Kween	Primary	1
UGA	Chepsukunya	1.582517	34.52515	Kween	Open bush	1
UGA	Lorengae	1.868017	34.585678	Nakapiriprit	Open bush	1
UGA	Lolachat	1.93427	34.55389	Nakapiriprit	Primary	1
UGA	Namalu	1.781455	34.601463	Nakapiriprit	Open bush	1
UGA	Karita	1.541005	34.82806	Amudat	Primary	1
UGA	Amudat town council	1.955108	34.94965	Amudat	Open bush	1
UGA	Camel market	1.955253	34.937069	Amudat	Open bush	1
UGA	Kanarwat	2.993847	34.090221	Kotido	Primary	1
UGA	Panyangara	2.956797	34.201447	Kotido	Open bush	1

UGA	Kacheri	3.09812	33.931675	Kotido	Primary	1
UGA	Nakapilemoru	3.000608	34.201447	Kotido	Open bush	1
UGA	Rengen	3.050512	34.090275	Kotido	Primary	1
UGA	Naitakwae	2.525402	34.638535	Moroto	Open bush	1
UGA	Nakiloro	2.61748	34.731697	Moroto	Open bush	1
UGA	Lomorutae	3.539022	34.11998	Kaabong	Primary	1
UGA	Iliri	2.129933	34.220558	Napak	Open bush	1
UGA	Kangole	2.437968	34.479343	Napak	Primary	1
UGA	Matany	2.437572	34.392139	Napak	Primary	1
KEN	Nasiger	3.364105	35.307457	Turkana	Open bush	1
KEN	Nadwat	3.511027	35.189201	Turkana	Primary	1
KEN	Kakuma	3.71175	34.8623	Turkana	Secondary	1
KEN	Kalobey	3.766498	34.621037	Turkana	Primary	1
KEN	Oropoi	3.81026	34.357494	Turkana	Primary	1
KEN	Lokkichogio	4.198457	34.364998	Turkana	Primary	1
KEN	Lomidat	4.163808	34.412354	Turkana	Primary	1
KEN	Letea	3.521577	34.665524	Turkana	Primary	1
KEN	Lokiriama	2.756142	34.871002	Turkana	Primary	1

KEN	Namorupus	2.840685	35.034721	Turkana	Primary	1
KEN	Kalemngorok	2.139865	35.496826	Turkana	Primary	1
KEN	Lorugum	2.882407	35.249859	Turkana	Primary	1
KEN	Turkwell	2.918693	35.397762	Turkana	Primary	1
KEN	Kerio	3.007082	36.055023	Turkana	Primary	1
KEN	Nakurio	2.871077	36.164547	Turkana	Open bush	1
KEN	Kangirisae	2.621227	36.254696	Turkana	Open bush	1
KEN	Katilia	2.132308	36	Turkana	Primary	1
KEN	Lokori	1.951852	36.02586	Turkana	Primary	1
KEN	Lokichar	2.383293	35.654831	Turkana	Secondary	1
KEN	Katilu	2.268472	35.430565	Turkana	Primary	1
KEN	Lochwar	2.602103	35.65358	Turkana	Primary	1
KEN	Kalakol	3.53949	35.8622	Turkana	Primary	1
KEN	Kaikor	4.51996	35.4202	Turkana	Primary	1
KEN	Kaaleng	4.37416	35.5503	Turkana	Primary	1
KEN	Lokitaung	4.27112	35.7525	Turkana	Primary	1
KEN	Loarengak	4.28186	35.8957	Turkana	Primary	1
KEN	Kaeris	3.9888	35.4797	Turkana	Primary	1
KEN	Kamukaridio	3.79761	35.463	Turkana	Primary	1

KEN	Lodwar	3.12334	35.5913	Turkana	Secondary	1
KEN	Kamila	2.05447	35.099159	West Pokot	Open bush	1
KEN	Konyao	1.787525	35.045334	West Pokot	Open bush	1
KEN	Orolwo	1.590792	34.987751	West Pokot	Primary	1
KEN	Cheptuya	1.259423	35.007847	West Pokot	Open bush	1
KEN	Lomut	1.40268	35.578362	West Pokot	Primary	1
KEN	Kanyarkwat	1.258502	34.914165	West Pokot	Open bush	1
KEN	Chepkobegn	1.459297	35.227798	West Pokot	Open bush	1
KEN	Chepareria	1.299878	35.195137	West Pokot	Primary	1
KEN	Ortum	1.444938	35.362881	West Pokot	Open bush	1
KEN	Kishaunet	1.280522	35.080284	West Pokot	Primary	1
KEN	Kacheliba	1.479	35.015	West Pokot	Open bush	1
ETH	Kangematen	5.182335	36.092884	Gnangatom	Open bush	1
ETH	Omuratae	4.796484	36.04929	Dasenech	Primary	1
ETH	Bubua	4.457153	36.227726	Dasenech	Open bush	1

ETH	Kibish	6.06575	35.434685	Surma	Open bush	1
ETH	Hado	4.6764	36.192001	Dasenech	Open bush	1
ETH	Koka	6.300036	35.39778	Surma	Open bush	1
ETH	Acobo	6.502242	35.189983	Surma	Open bush	1
KEN	Merile	1.413752	37.722836	Marsabit	Secondary	2
KEN	Moyale	3.512905	39.064507	Marsabit	Secondary	2
KEN	Jirime	2.356397	37.996265	Marsabit	Secondary	2
ETH	Arbale	3.537559	39.036133	Moyale	Secondary	2
ETH	Magado	3.887918	38.215900	Dire	Secondary	2
ETH	Boku	3.873188	38.687988	Miyo	Secondary	2
ETH	Bulade	3.533538	39.041496	Moyale	Secondary	2
ETH	Dilo	4.263481	37.697487	Dilo	Secondary	2
ETH	Dubluk	4.362243	38.271360	Dire	Secondary	2
ETH	Mega	4.033000	38.332000	Dire	Secondary	2
ETH	Elwaye	4.971631	37.896120	Yabelo	Secondary	2
ETH	Harrow bakke	4.990788	38.207164	Yabelo	Secondary	2
KEN	Sololo	3.546504	38.646717	Marsabit	Primary	2
KEN	Forole	3.719750	37.961900	Marsabit	Primary	2

KEN	Turbi	3.295270	38.379795	Marsabit	Primary	2
KEN	Kargi	2.506360	37.569570	Marsabit	Primary	2
KEN	Korr	2.011246	37.512383	Marsabit	Primary	2
KEN	Kalacha	3.130233	37.420193	Marsabit	Primary	2
KEN	Olturot	2.594934	37.086517	Marsabit	Primary	2
KEN	Illaut	1.865962	37.252129	Marsabit	Primary	2
KEN	Illaut	1.866440	37.252050	Samburu	Primary	2
KEN	Dukana	3.992540	37.225080	Marsabit	Primary	2
KEN	North Horr	3.321824	37.064720	Marsabit	Primary	2
KEN	Dirib Gobo	2.300907	38.044474	Marsabit	Primary	2
KEN	Illeret	4.316700	36.216700	Marsabit	Primary	2
KEN	Odda	3.490000	39.090000	Marsabit	Primary	2
KEN	Dukana	3.995770	37.267070	Marsabit	Open bush	2
KEN	Saru	4.178430	37.188810	Marsabit	Open bush	2
KEN	Maikona	2.940183	37.627065	Marsabit	Open bush	2
KEN	Loyiangalani	2.744400	36.714600	Marsabit	Open bush	2
ETH	Hidilalo	3.742000	38.748000	Miyo	Open bush	2
ETH	Soda	4.197031	38.388157	Dire	Open	2

					bush	
ETH	Tuka	3.650008	38.799999	Moyale	Open bush	2
KEN	Moyale	3.523893	39.059460	Marsabit	Open bush	2
KEN	Dabel	3.160000	39.260000	Marsabit	Open bush	2
KEN	Godoma	3.470000	39.310000	Marsabit	Open bush	2
KEN	Loglogo	2.000000	37.920000	Marsabit	Open bush	2
KEN	Ngururnit	1.750000	37.310000	Marsabit	Open bush	2
KEN	Gas	3.060000	36.830000	Marsabit	Open bush	2
KEN	El hadi	3.800000	37.530000	Marsabit	Open bush	2
KEN	Balesa	3.610000	37.340000	Marsabit	Open bush	2
ETH	Surupa	5.135805	38.294330	Yabelo	Open bush	2
KEN	Malka Sedeqa	4.136000	37.513000	Dilo	Open bush	2
ETH	Debagaya	4.852760	37.260498	Teltele	Open bush	2

ETH	Kuulcha	5.119184	37.264534	Teltele	Open bush	2
ETH	Teltele Town market	5.062167	37.387993	Teltele	Primary	2
KEN	Burmayow	3.007777778	40.25833333	Mandera	Primary	3
KEN	Omar Jilo	3.756111111	41.66611111	Mandera	Primary	3
KEN	Olla	3.894722222	40.86055556	Mandera	Primary	3
KEN	Hareri	3.906666667	41.37333333	Mandera	Primary	3
KEN	Sala	3.93444444	41.28027778	Mandera	Primary	3
KEN	Kutolu Mandera	3.407777778	40.59388889	Mandera	Primary	3
KEN	Kilwehiri	3.916944444	40.01277778	Mandera	Primary	3
KEN	Damasa	3.161111111	41.32888889	Mandera	Primary	3
KEN	Arabia	3.559166667	41.50472222	Mandera	Primary	3
KEN	Khalalio	3.966111111	41.61916667	Mandera	Primary	3
KEN	Wargadud	3.178333333	40.8555556	Mandera	Primary	3
KEN	Warankara	3.409722222	41.015	Mandera	Primary	3
KEN	Fino	3.458055556	41.525	Mandera	Primary	3
KEN	Elwak	3.822777778	40.94916667	Mandera	Primary	3
KEN	Takaba	3.39555556	40.22305556	Mandera	Secondary	3
KEN	Mandera town	3.939166667	41.86361111	Mandera	Secondary	3
KEN	Banisa	3.950277778	40.34972222	Mandera	Secondary	3
KEN	Ashabito	3.549166667	40.86916667	Mandera	Secondary	3

KEN	Rhamu	3.931944444	41.2225	Mandera	Secondary	3
KEN	Lafey	3.15	41.18388889	Mandera	Secondary	3
KEN	Albaqeramso B Market	1.7754517	40.2950500	Wajir	Open bush	3
KEN	Wajir Bor Market	1.7426916	40.5367470	Wajir	Open bush	3
KEN	Riba B Market	1.8743516	40.6288220	Wajir	Open bush	3
KEN	Qarsa	2.0778300	40.7470130	Wajir	Open bush	3
KEN	Khorof Harar Market- Current	2.2021484	40.7534750	Wajir	Open bush	3
KEN	Khorof Harar Proposed L.Market	2.2047417	40.7418000	Wajir	Open bush	3
KEN	Kotulo Wajir B Market-Current	2.4060750	40.5942650	Wajir	Open bush	3
KEN	New Kotulo Wajir L. Market	2.4286966	40.6203960	Wajir	Open bush	3
KEN	Walgadud B Market	2.3093183	40.3612630	Wajir	Open bush	3
KEN	Elben B Market	2.3032334	40.1847650	Wajir	Open bush	3
KEN	Dambas B Market	2.4060133	40.0162850	Wajir	Open bush	3
KEN	Manza B Market	2.5325117	40.2236000	Wajir	Open	3

					bush	
KEN	Oglale B Markret	2.7500882	40.2073630	Wajir	Open bush	3
KEN	Dunto B Market	2.7106950	39.9889450	Wajir	Open bush	3
KEN	Basanaji B Market- Shoats	2.8332950	39.9080240	Wajir	Open bush	3
KEN	Basanaji B Market- Camel	2.8308184	39.9031260	Wajir	Open bush	3
KEN	Batalu B Market	2.8357866	39.8513340	Wajir	Open bush	3
KEN	Ajawa Livestock Mkt	2.9618566	39.6891750	Wajir	Open bush	3
KEN	Kalikilo B Market	3.1570916	39.6026760	Wajir	Open bush	3
KEN	Bute Main Market	3.3584850	39.4192050	Wajir	Secondary	3
KEN	Korondile Proposed B Livestock Market	2.9956400	39.3129160	Wajir	Open bush	3
KEN	Korondile B Market	2.9889433	39.3154700	Wajir	Open bush	3
KEN	Leisayu B Market	2.8734834	39.2756270	Wajir	Open bush	3
KEN	Belamo Village	2.9346466	39.4853600	Wajir	Open bush	3
KEN	Buna Livestock Market	2.7914250	39.5022240	Wajir	Open	3

					bush	
KEN	Markagufu B Market	2.6434650	39.5739900	Wajir	Open bush	3
KEN	Eldas Livestock Market	2.4921650	39.5640220	Wajir	Secondary	3
KEN	Eldas Market-Proposed	2.4979718	39.5651200	Wajir	Secondary	3
KEN	Anole B Livestock Market	2.4967300	39.7339400	Wajir	Open bush	3
KEN	Anole A Livestock Market	2.3030517	39.7087940	Wajir	Open bush	3
KEN	Dela B Market	2.3030767	39.7087860	Wajir	Open bush	3
KEN	Gongar Bakalcha	1.2360916	40.1160130	Wajir	Open bush	3
KEN	Kursin	1.1020017	40.2592770	Wajir	Open bush	3
KEN	Machesa	1.0122766	40.2724840	Wajir	Open bush	3
KEN	Burder	1.1870333	40.4550000	Wajir	Open bush	3
KEN	Diff	0.9944483	40.9626160	Wajir	Open bush	3
KEN	Salelma	0.9254683	40.7165760	Wajir	Open bush	3
KEN	Dadajabula	0.5385283	40.8753620	Wajir	Open bush	3

KEN	Sarif	0.5961700	40.5990800	Wajir	Open bush	3
KEN	Biamathow	0.6142050	40.4109840	Wajir	Open bush	3
KEN	Sebule	0.3489250	40.1116640	Wajir	Open bush	3
KEN	Fini	0.4137667	40.0131450	Wajir	Open bush	3
KEN	Dalsan	0.4534867	39.9182970	Wajir	Open bush	3
KEN	Meri	0.4917800	39.8471870	Wajir	Open bush	3
KEN	Abakore	0.6294500	39.7082100	Wajir	Open bush	3
KEN	Dilmanyale	0.8433250	39.5698550	Wajir	Open bush	3
KEN	Habaswein	1.0238550	39.4936100	Wajir	Open bush	3
KEN	Lagbogol	1.2881850	39.8412100	Wajir	Open bush	3
KEN	Hadado	1.5304084	39.4280500	Wajir	Open bush	3
KEN	Athibohol	1.7032983	39.2150100	Wajir	Open bush	3
KEN	Garsegoftu	1.8114467	39.1600400	Wajir	Open bush	3

KEN	Arbajahan	2.0673966	39.0062070	Wajir	Open bush	3
KEN	Griftu	1.9995717	39.7487950	Wajir	Open bush	3
KEN	Tulatula	1.8910067	39.8245400	Wajir	Open bush	3

ANNEX 3: SUMMARY OF CURRENT LIVESTOCK MARKET INFRASTRUCTURE STATUS IN RPLRP CLUSTER 1

a. Kenya cross border livestock markets in Turkana and West Pokot districts.

General infor	mation	Market Infrastructure				
Livestock market	County/woreda/district	Market type	Available	Not available	Remarks	
Kamila	West Pokot	Open bush	No structure in place as it is an open bush market, however has a designated sale space for various livestock types. No structure in place as it is an open market		 Active cross border market but with no structure in place. Has designated sale space for camel, shoats and cattle 	
Konyao	West Pokot	Open bush market			 No structure in place Proposed sale yard to be constructed under the RPLRP project where sale yard, weighing scales etc are to be provided. 	
Orolwo	West Pokot	Primary market	Shelters, Loading Ramp, sale yard Fencing, store, offices, toilets	Water trough, Feeding trough/point, clinic, isolation area, incinerator, weight balance.	 Has structure in place in relatively good condition. Loading ramp is reinforced with steel. Fence and sale yard made from wooden material. Has permanent / constructed shade and offices in place. It is the biggest catchment market in Pokot North that coincides with the usual market 	

					days. • Constructed by NDMA.
Kacheliba	West Pokot	Open bush market	No structure in pla	ace as construction is ongoing	Construction in progress and ongoing
Cheptuya	West Pokot	Primary market	Loading ramp, fencing, sale yard, water trough,	Weight balance, feeding trough, store, clinic, toilet, incinerator, stall, store	 Has designated sale yard for large and small stock. Has a loading ramp, fence and shade in place. Ongoing construction on a proposed new site by AFDB that will have all features except feeding truff. Challenge of water availability.
Lomut	West Pokot	Primary market	Sale yard, feeding trough,	Water trough, isolation area, incinerator, clinic, weight balance, loading ramp, shelter, feeding trough.	Existing structures require renovations
Kanyarkwat	West Pokot	Open bush market	No structures in pongoing	place as construction is	No structure in place. • There is a proposed new site however construction has not started. • Active market.
Chepkobegn	West Pokot	Open bush market	No structures in pongoing	place as construction is	Construction is ongoing that aims to have all structures in place except

					Incinerator.
Chepareria	West Pokot	Primary	Loading ramps, fence, toilets, sale yard, isolation area, Water trough, office	Feeding troughs, clinic, incinerator, weight balance, store, stalls	 County government has plans for upgrading of the market. The land belongs to the cattle dip association that have equipped the market with the current limited structures Offices, stalls are made from wooden material Considered a major terminal market and very active.
Ortum	West Pokot	Primary market	Loading ramp, fence, sale yard, toilet	Feeding troughs, clinic, incinerator, weight balance, store, stalls, water trough	 Structures in place are loading ramp, fence and sale yard. Ongoing construction by AFDB that would have all structures in place. Has LMA
Kishaunet	West Pokot	Primary market	Loading ramp, fence, sale yard, toilet, office	Feeding troughs, clinic, incinerator, weight balance, store, stalls, water trough	 Active livestock market that serves a greater catchment area. Most cattle in the other markets are trekked to this market for loading purposes since the area is relatively flat and accessible to major town. Current infrastructure in place require repair and

					upgrading owing to the large volumes of livestock traded. • Has designated sale yard for shoats and cattle, fence from wooden material, • Has a LMA in place.
Nasiger	Turkana	Open bush market	No structure in place	ce as it is an open market	Livestock are traded openly in the area thus no designated market place.
Nadwat	Turkana	Primary market	Fencing, sale yard, slaughter slab, loading ramp, slaughter slab	Feeding troughs, clinic, incinerator, weight balance, store, stalls, water trough	 Current market infrastructure require general upgrading/repair Constructed by GIZ and VSF Germany under Rapid II project. Slaughter slab should be removed from sale yard.
Kakuma	Turkana	Secondary market	Shelter, loading ramp, fence, sale yard, toilets, office	Feeding trough, water trough, clinic, isolation area, clinic, store, weight balance	 Active livestock market that serves a greater catchment area. Market infrastructure in good condition. Constructed by Turkana Food Security Program (TUPADO), funded by USADF.
Kalobey	Turkana	Primary market	Shelter, loading ramp, fence, sale yard, toilets,	Feeding trough, water trough, clinic, isolation area, clinic, store, weight	The current structures are in good condition.Constructed by Turkana

			office, slaughter slab, ware house	balance	Food Security Program (TUPADO), funded by USADF. • Has a slaughter slab in place but should be removed. • Warehouse structure is in place but not functioning due to piping problems.
Oropoi	Turkana	Primary market	Shelter, loading ramp, fence, sale yard, toilets, office,	Feeding trough, water trough, clinic, isolation area, clinic, store, weight balance	The current structures are in good condition. Supported by International Rescue Committee, funded by USAID. Has designated sale yard for different livestock type Watering point has not been improved since the water point/trough was lacking.
Lokkichogio	Turkana	Secondary market	Loading ramp, sale yard, fencing, toilet, offices	Feeding trough, water trough, clinic, isolation area, clinic, store, weight balance, shelter	The current structures are poor condition, Supported by International Rescue Committee, funded by USAID. Has designated sale yard for different livestock type

					Catchment area for the market are far and prefer barter trading.
Lomidat	Turkana	Primary	Fence, sale yard	Loading ramp, shelter, Feeding trough, water trough, clinic, isolation area, clinic, store, weight balance, shelter	Market not in operational state.
Letea	Turkana	Primary	Fencing, sale yard, weight balance, water trough	Loading ramp, stall, offices, isolation area, store, clinic	Traders prefer to sell outside the sale yard. Poor welding of the sale yard infrastructure. Has weigh balance that's nonfunctional.
Lokiriama	Turkana	Primary	Loading ramp, fence, sale yard	Shelter, Feeding trough, water trough, clinic, isolation area, clinic, store, weight balance, shelter	 Isolated market due to poor siting. The infrastructure are in poor condition.
Kalemngorok	Turkana	Open bush market	No structure in place as it is being constructed.		New infrastructure is being put up by DRSPLP. Active market.
Lorugum	Turkana	Primary market	Water trough, fencing, sale yard, loading ramp,	Feeding trough, clinic, isolation area, clinic, store, weight balance, shelter	•Shelters, loading ramp, fencing and sale yard are under construction. Not very active market.
Turkwell	Turkana	Primary market	Loading ramp, fencing, sale yard	Feeding trough, clinic, isolation area, clinic, store, weight balance, shelter, water trough	Traders prefer to sell outside the sale yard The infrastructure are in fair condition.

					•
Kerio	Turkana	Primary market	Shelter, loading ramp, fence, sale yard	Feeding trough, clinic, isolation area, store, weight balance, water trough	Active market The infrastructure are in good condition.
Nakurio	Turkana	Primary market	Loading ramp, fence, sale yard	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter	•Recently fenced • Fairly active market. Haa water tanks within the market.
Kangirisae	Turkana	Open bush market	No structure in place as it is under construction		•Under construction by FAO.
Katilia	Turkana	Primary market	Fencing, sale yard, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter	Sale yard in place but no evidence of its use. Wooden infrastructure.
Lokori	Turkana	Primary market	Fencing, sale yard, slaughter house, loading ramp, shelter,	Feeding trough, clinic, isolation area, store, weight balance, water trough	•Infrastructure needs general repair and additional water trough/points are needed. • Slaughterhouse is located within the sale yard. • Active market.
Lokichar	Turkana	Primary market	Sale yard, loading ramp, fencing, water trough	Feeding trough, clinic, isolation area, store, weight balance, shelter,	•Infrastructure needs general repair and additional water trough/points are needed.

					 Slaughterhouse is located within the sale yard. Active market.
Katilu	Turkana	Primary market	Sale yard,, fencing, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter,	•Dormant market. Prosopis has evaded the structure.
Lochwar	Turkana	Primary market	Sale yard,, fencing, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter,	Sale yard is deserted thus not in use.signs vandalism
Kalakol	Turkana	Primary market	Sale yard, fencing, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter,	•Sale yard is in poor state.
Kaikor	Turkana	Primary market	Sale yard, fencing, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter,	•Sale yard is in poor state
Kaaleng	Turkana	Primary market	Sale yard, fencing, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter,	 Fairly active sale yard Structures are in poor condition.
Lokitaung	Turkana	Primary market	Sale yard, fencing, loading ramp	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter,	In poor conditionMarket fairly active

Loarengak	Turkana	Primary market	Fencing, sale yard	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter, loading ramp	Traders prefer trading at the town center. Fair market structure.
Kaeris	Turkana	Primary market	Fencing, sale yard	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter, loading ramp	Traders prefer trading at the town center. Fair market structure.
Kamukaridio	Turkana	Primary market	Fencing, sale yard	Feeding trough, clinic, isolation area, store, weight balance, water trough, shelter, loading ramp Feeding trough, clinic, isolation area, store, weight balance, water thus not in use.	
Lodwar	Turkana	Secondary market	Sale yard, fencing, loading ramp clinic, shelter, sale yard	weight balance, water • Good market struct	
Namorpus	Turkana	Primary market	Sale yard, fencing, loading ramp	Shelter, Feeding trough, clinic, isolation area, store, weight balance, water trough	Traders prefer trading at the town center. Fair market structure.

b. Uganda cross border livestock markets in Kaabong, Moroto, Kotido, Napak, Nakapiripiprit, Kween and Amudat districts

General infor	General information		Infrastructure status			
Livestock market	County/woreda /district	Market type	Available	Not available	Remarks	
Binyiny TC	Kween	Open bush market	Loading ramp. Fence, sale yard, toilets	Feeding trough, water trough, Incinerator, weight balance, isolation area, clinic, store	Limited market infrastructure in place that require general upgrading/repair and construction of other structures. Fence is made from wooden materials.	
Chemamul	Kween	Open bush	Loading ramp. Fence, sale yard	Feeding trough, water trough, Incinerator, weight balance, isolation area, clinic, store	 Limited market infrastructure in place that require general upgrading/repair and construction of other structures. Fence is made from wooden material. 	
Ngenge	Kween	Primary market	Loading ramp. Fence, sale yard	Feeding trough, water trough, Incinerator, weight balance, isolation area, clinic, store	 Current structures in good condition but need repair Fence is made from steel material. Sale yard requires compartilization Market constructed by AFDB in 1965. 	
Lorengae	Nakapiripirit	Open bush market	No structure in place as	s it is an open mark	ket but an active market	
Lolachat	Nakapiripirit	Primary market	Loading ramp. Fence, sale yard, water trough, shelter, crushes, toilets	Feeding trough, Incinerator, weight balance,	The structures are generally in good condition but require repair. Had 2 loading ramps reinforced with	

				clinic, store	concrete and steel and fence made from steel and reinforced with wires that needs repair. • The fence requires repair as the strings have loosened up. • Active management that overlooks operation of the market as well as collection of market information.
Namalu	Nakapiripirit	Open bush market	Loading ramp, Fence	Feeding trough, water trough, Incinerator, weight balance, isolation area, clinic, store	No structure in place as it is an open market positioned opposite district production land.
Karita	Amudat	Primary market	Loading ramp, shelter, toilets, fence, sale yard	Feeding trough, water trough, Incinerator, weight balance, isolation area, clinic, store	 The structures need require repair. Stalls made from wooden material The fence requires repair as the strings have loosened up. Loading ramp reinforced with steel.
Amudat TC	Amudat	Open bush market	Lacks market infrastructure as it is an open bush market		 No structure in place as it is within the town council and it's open. Has crush within the vicinity that is used for vaccination. Availability of money transfer services and currency conversion.
Amudat Camel market	Amudat	Open bush market	Lacks market infrastructure as it is an open bush market		No structure in place as it is an open market Only trades in camel.

Kanarwat	Kotido	Primary market	Loading ramp, shelter, toilets, fence, sale yard, weight balance	Feeding trough, water trough, Incinerator, isolation area, clinic, store	 The structures need require repair. Has steel fence, sale yard, 5 loading ramps reinforced with steel, shelters made from twigs, weight balance though nonfunctional. Constructed by Mercy Corps Active market as it serves as the main collection market for all livestock markets within and beyond Kotido.
Panyangara	Kotido	Open bush market	Lacks market infrastruct open bush market.	ure as it is an	No structure in place as it is an open market
Kacheri	Kotido	Primary market	Loading ramp, shelter, toilets, fence, sale yard, weight balance. stalls	Feeding trough, water trough, Incinerator, isolation area, clinic, store	 The structures in require rehabilitation. Has 3 loading ramps. Shelters/stalls are made from twigs.
Nakapilemoru	Kotido	Open bush market	Lacks market infrastruct open bush market.	ure as it is an	No structure in place as it is an open market.
Rengen	Kotido	Open bush market	Fence, sale yard	Feeding trough, water trough, Incinerator, isolation area, clinic, store, loading ramp, water trough	The structures in place require repair. Open market has been demarcated. Fence made from steel material.
Naitakwae	Moroto	Primary market	Water trough, sale yard, crush, toilets	Feeding trough, Incinerator, isolation area, clinic, store, loading ramp,	 The structures in place are dilapidated. Has a sale yard though not fenced and the crush is made from wooden material. Accessible to both money transfer and

				fence, stall, shelter, water trough	banking services.
Nakiloro	Moroto	Open bush market	Sale yard, fence	Feeding trough, Incinerator, isolation area, clinic, store, loading ramp, stall, shelter, water trough	 Only fence is available that demarcates it from the produce market. Active cross border market funded that is within the produce market funded by UNDP.
Lomorutae	Kaabong	Primary market	Loading ramp, shelter, toilets, fence, sale yard, stall, clinic, office, shelter	Feeding trough, Incinerator, isolation area, water trough	 Market infrastructure generally in good condition but need repair but some structures need to be operationalized. Sale yard needs partioning, current fence needs reinforcement and the current shelters need expansion so as to accommodate more sale of other commodities in the market. Store, vet and need office are existing however not operational
Iliri	Napak	Open bush market	No structure in place as it is an open market.		No structure in place as it is an open market.
Kangole	Napak	Primary market	Shelter, fence, sale yard, slaughter slab, toilets	Water trough, Feeding trough, Incinerator, isolation area, clinic, store, loading ramp, stall	 Present market infrastructure are in poor condition as they were vandalized during the strife era. Positioned in close proximity to the produce market.

Matany	Napak	Primary market	Shelter, fence, sale yard, feeding trough, toilets, office, clinic,	Water trough, Incinerator, isolation area,	 Present market infrastructure are in good condition but require minor repair. Sale yard is partioned to accommodate
a.a.ry			loading ramp	clinic, store, stall	 different livestock types Fence and loading are made from steel and reinforced with concrete.

c. Ethiopia cross border markets in Surma, Gnangatom, and Dasenech woredas

General informa	General information			Infrastructure status		
Livestock market	County/woreda/d istrict	Market type	Available	Not available	Remarks	
Kangematen	Gnangatom	Open bush market	Lacks market structure bush market.	as it as open	 Absence of normalized marketing system for the last 25 years. Serves as an important trade center between Kenya and Ethiopia. 	
Omuratae	Dasenech	Primary market	Shelter, fence, sale yard, loading ramp	Water trough, feeding trough, toilets, offices, incinerator, weighing	 Presence of sale yard, however, it is not partioned. Fence is made of wooden material. Presence of weighing scale, however not functional. Lack of feed and water troughs. Lack of permanent shade structure. 	

			scale, isolation area	
Hado	Dasenech	Open bush market	No structure in place as it is an open market.	 Lack structures in place as it is an open bush market. It is less active as compared to other bush markets in the dasenech
Bubua	Dasenech	Open bush market	Limited structures such as crushes, health post .	 It is important cross border market. Has a vaccination crush but needs repair Has health post that needs repair. Lack of incineration chamber, toilets.
Koka	Surma	Open bush market	No structure in place as it is an open market.	No structure in place as it is an open market.
Acobo	Surma	Open bush market	No structure in place as it is an open market.	No structure in place as it is an open market.
Kibish	Surma	Open bush market	No structure in place as it is an open market.	No structure in place as it is an open market.

ANNEX 4: SUMMARY OF LIVESTOCK MARKET INFRASTRUCTURE IN RPLRP CLUSTER 2

General information	1	Market Infrastructure		Compand remodes	
Livestock market	Market type	Available	Not available	General remarks	
Sololo	Primary	Shelters. Loading Ramps, Fencing, Water truff/point, store, sale yard clinics, isolation area, stalls and toilets	Feeding truffs, weight balance, incinerator	 Newly constructed by IGAD for peace building initiative. The infrastructures are permanent in good condition. Nonfunctional/partial use of loading of livestock since the market has not been handed over officially. Fence and separation pens reinforced by steel material. May require additional sourcing of water. Present and active Livestock market association 	
Moyale	Secondary	Shelters, Loading Ramps, Fencing, Feeding truffs store, sale yard clinics, weight balance isolation area, stalls and toilets	Water truff, incinerator	 The infrastructures are permanent but require repair. Fence and separation pens reinforced by steel material. Conflict between communities has led to reduced trade and vandalization of weight scales and fencing. Provides linkages to market in Ethiopia as a border market 	
Merile	Primary	Shelters, Loading Ramps, sale yard Fencing	Water truff/point, feeding truff/point, clinic, isolation area, incinerator, weight balance.	 Has market structure/ sale yard. Shelters and shade are temporal and made of local materials Currently has minimal infrastructure mostly wooden material. Fence and separation pens made of wooden material. Market is being upgraded by USAID in a nearby site to a modern livestock market. Trades in all livestock types but mostly cattle and camels. 	
Jirime	Secondary	Loading Ramp, Fencing, Weight balance, sale	Water truff, clinic, isolation area	Structures / sale yard are in place, however, they require repair, weight balance is not operational, and fence is broken.	

Kalacha	Primary	yard feeding truffs, store and toilet facilities, Shelters(trees), Loading Ramp, store, toilet, fencing, hay store, sale yard	Water truff/point, feeding truff/point, clinic, isolation area, incinerator, weight balance.	•	Fence and separation pens made of wooden material. Water tank in place. Located in the Marsabit town and active market Structures / sale yard are in place Fence and separation pens made of wooden material. Existence of trees that provide for shade and base for placement of weight scales. Hay store is available.
North Horr	Primary	Shelters, loading ramps, fencing, store, toilets, hay store, sale yard	Watertruff, isolation area, incinerator, clinic weight balances	•	Structures / sale yard are in place and generally in good condition. Fence and separation pens made of wooden material. Fodder warehouse in place funded by DFID. Locally sell of their goats locally while to Ethiopia they trade on sheep and camel. Sheep based on live weight. Serves also as a collection point.
Forole	Open market	No structures in p ongoing	lace as construction is	•	Currently under construction. Serves as collection point for trade to Ethiopia. It is a proposed border inspection point.
Illaut- Marsabit	Primary	Shelters, Loading ramps, fence, toilets, sale yard	Water truff/point, feeding truffs, store, clinic, incinerator, weight balance.	•	Structures / sale yard are in place are in good condition. Fence and separation pens made of wooden material. Shelters made of temporary local materials and require upgrading to permanent structures. Serves as an active market for all livestock types. Water and grazing areas sources are nearby
Illaut- Samburu	Primary	Shelters, Loading ramps, fence, toilets,	Feeding truffs, clinic, incinerator, weight balance.	•	Structure are new and in good condition. Recently constructed. Fence, loading ramps and separation pens

		sale yard store, and water point.			reinforced by steel material.
Dukana	Primary	Shelters, Loading ramps, fence, toilets, sale yard	Water truff/point, feeding truffs, store, clinic, incinerator, weight balance.	•	Fence and separation pens made of wooden material. Loading ramp vandalized, Generally requires rehabilitation. Not operational
Dukana open market	Open market	No structure in pla market	ace as it is an open	M	ainly deal with trade of small stock
Moyale Open market	Open market	No structure in pla market	ace as it is an open	•	Deals with trade of shoats in the town located near the stadium and heavily infested by traders.
Turbi	Primary	Shelters, loading ramp, fencing, sale yard	Water truff, feed truff, store, clinics, isolation area, weight balance	•	Structures/ sale yard are in good condition. Fence and separation pens made of wooden material. Mostly trade on sheep due to influence by Ethiopian traders and serves as an active cross border market.
Korr	Primary	Loading ramp, shelters, toilets, fence, office, sale yard	Water truff, feed truff, store, clinics, isolation area, weight balance	•	Structures/ sale yard are in good condition. Stalls and shelters made of local material. Fence and separation pens made of wooden material Construction and upgrading plans are ongoing by REGAL AG.
Olturot	Primary	Loading ramp, toilets, fence, water tank, vaccination crush, sale yard	Shelters, Water truff, feed truff, store, clinics, isolation area, weight balance	•	Structures/ sale yard are in place. Fence and separation pens made of wooden material
Kargi	Open bush market	Fence and sale ya additional structur	ard is present but with no e.	•	Presence of a sale yard with a fence in place but need repair.
Saru	Open market	No structure in pla	ace	•	Mainly deal with trade of small stock
Odda	Primary	Fence, office, toilets, sale yard	Shelters, Water truff, feed truff, store, clinics, isolation area, weight balance	•	Fence and separation pens made of wooden material Yard requires general repair as some of the

			structures have been vandalized.
Dirib Gobo	Primary	Fence, loading ramp, sale yard	•
Ngurunit	Open bush market	No structure in place as it is market	Livestock usually taken to Illaut market
Balesa	Open bush market	No structure in place as it is market	Animals sold by the water points-balesa wells
Dabel	Open bush market	No structure in place as it is market	Transactions done at the water points
Godoma	Open bush market	No structure in place as it is market	Itinerant traders who in turn sell to Moyale market
El Hadi	Open bush market	No structure in place as it is market	Animals traded out in the fora
Gas	Open bush market	No structure in place as it is market	 Animals traded in the watering areas such as the laga near Gas
Loyiangalani	Open bush market	No structure in place as it is market	Animals traded in the town
Loglogo	Open bush market	No structure in place as it is market	Animals are taken to nearby Merile market
Maikona	Open bush market	No structure in place as it is market	 Animals are traded nearby the water points- maikona wells
Arbale	Secondary market	Water truff, water tank fence, loading ramp, Offices, stalls, fence, feeding point, clinics, toilets, isolation area, sale yard	 The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel. Shelters are rudimentary structures made from local material. However the market is not functional, distance was cited as the major cause as it is sited far way for the traders to access.
Bulade	Secondary	Water truff, water tank fence, loading ramp, shelters, Offices, stalls,	

		fence, feeding point, clinics, toilets, isolation area, sale yard		Shelters are rudimentary structures made from local material. Water truff not functional as the water piping has not been connected
Boku	Secondary	Water truff, We	eight balance, inerator	 The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel.
Hidilalo	Bush market	No structure in place a market	as it is an open	 No structure but an active market due to influence of brokers
Dubluk	Secondary		eight balance, inerator	 Water truff not functional as the water piping has not been connected The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel. Shelters are rudimentary structures made from local material. Water truff not functional as the water piping has not been connected
Magado	Secondary		eight balance, inerator	 Water truff not functional as the water piping has not been connected The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel.
Mega	Secondary			Under construction
Dilo	Secondary	Water truff, She water tank	elter, weight balance	Water truff not functional as the water piping has not been connected

	fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard		 The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel.
Elwaye	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard	Shelter, weight balance	 Water truff not functional as the water piping has not been connected The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel. Loading ramp is far from the isolation area.
Harrow bake	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard	Shelter, weight balance	 Water truff not functional as the water piping has not been connected The structures are generally in good condition. Separation pens and loading ramp are reinforced with steel Fence made of concrete and reinforced with steel.

ANNEX 5: SUMMARY OF MARKET INFRASTRUCTURE STATUS IN RPLRP CLUSTER 3

General Information			Market Infrastructure			
Name	County /Woreda	Туре	Available	Not Available	Remarks	
Burmayow	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Omar Jilo	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Olla	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic, feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Hareri	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Sala	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Kutolu Mandera	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Kilwehiri	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Damasa	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Arabia	Mandera	Primary	Fence, sale yard	Shelters, Loading ramps, toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	
Khalalio	Mandera	Primary	Shelter, loading ramp, fence	toilets, clinic,feeding trough, and water point, incinerator	Current structure in good place but require repair and upgrading	

				Shelters, Loading ramps, toilets,	
				clinic, feeding trough, and water point,	Current structure in good place but
Wargadud	Mandera	Primary	Fence, sale yard	incinerator	require repair and upgrading
				Shelters, Loading ramps, toilets,	
				clinic,feeding trough, and water point,	Current structure in good place but
Warankara	Mandera	Primary	Fence, sale yard	incinerator	require repair and upgrading
				Shelters, Loading ramps, toilets,	
				clinic, feeding trough, and water point,	Current structure in good place but
Fino	Mandera	Primary	Fence, sale yard	incinerator	require repair and upgrading
				Shelters, Loading ramps, toilets,	
1				clinic, feeding trough, and water point,	Current structure in good place but
Elwak	Mandera	Primary	Fence, sale yard	incinerator	require repair and upgrading
			Shelters, Loading		
			ramps, fence, toilets,		
			clinic, sale yard, and		
			water point, weight		Current structure in good place but
Takaba	Mandera	Secondary	balance	Store, incinerator,	require repair
			Shelters, Loading		
			ramps, fence, toilets,		
			clinic, sale yard, and		
Mandera			water point, weight		Current structure in good place but
town	Mandera	Secondary	balance	Store, incinerator,	require repair
			Shelters, Loading		
			ramps, fence, toilets,		
			clinic, sale yard, and		
.			water point, weight		Current structure in good place but
Banisa	Mandera	Secondary	balance	Store, incinerator,	require repair
			Shelters, Loading		
			ramps, fence, toilets,		
			clinic, sale yard, and		Ourse of atmost one in second place but
A = l= = l= !t =	NA l	0	water point, weight	Otana in sin anatan	Current structure in good place but
Ashabito	Mandera	Secondary	balance Loading	Store, incinerator,	require repair
			Shelters, Loading		
			ramps, fence, toilets,		Commont atmost up in good place but
Dhamu	Mandars	Coconde	clinic, sale yard, and	Ctore inciparator	Current structure in good place but
Rhamu	Mandera	Secondary	water point, weight	Store, incinerator,	require repair

			balance		
Lafey	Mandera	Secondary	Shelters, Loading ramps, fence, toilets, clinic, sale yard, and water point, weight balance	Store, incinerator,	Current structure in good place but require repair
Albaqeramso B Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Wajir Bor Market	Wajir	Secondary	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard	Incinerator	Current structure in good place but require repair
Riba B Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Qarsa	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Khorof Harar Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure

Kotulo Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
New Kotulo Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Walgadud Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Elben Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Dambas B Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Manza Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Oglale Markret	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Dunto Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure

Basanaji				Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence,	
Market-				clinics, toilets, isolation area, sale	
Shoats	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
Onoats	vvajii	Орспризп	TVOTIC	Water truff, water tank fence, loading	Lacks market initiastructure
Basanaji				ramp, shelters, Offices, stalls, fence,	
Market-				clinics, toilets, isolation area, sale	
Camel	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
Odifici	vvajii	Орен вазн	None	Water truff, water tank fence, loading	Lacks market imastructure
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Batalu Market	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
Dataia Markot	v v cajii	Орон вион	110110	Water truff, water tank fence, loading	Edono markot ilimadi adia10
				ramp, shelters, Offices, stalls, fence,	
Ajawa				clinics, toilets, isolation area, sale	
Livestock Mkt	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
		- противонет		Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
Kalikilo				clinics, toilets, isolation area, sale	
Market	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
	,	•	Water truff, water tank		
			fence, loading ramp,		
			shelters, Offices,	la dia a rata r	
			stalls, fence, clinics,	Incinerator	
Bute Main			toilets, isolation area,		Current structure in good place but
Market	Wajir	Secondary	sale yard		require repair
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
Korondile				clinics, toilets, isolation area, sale	
Market	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
Leisayu				clinics, toilets, isolation area, sale	
Market	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure

Belamo	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Buna Livestock Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Markagufu Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Eldas Livestock Market	Wajir	Secondary	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard	Incinerator	Current structure in good place but require repair
Anole Livestock Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Anole Livestock Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Dela Market	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure
Gongar Bakalcha	Wajir	Open bush	None	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard, weight balance, incinerator	Lacks market infrastructure

				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Kursin	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Machesa	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Burder	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Diff	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Salelma	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Dadajabula	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Sarif	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Biamathow	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Sebule	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure

				Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Fini	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Dalsan	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Meri	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Abakore	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Dilmanyale	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
Habaswein	Wajir	Secondary	Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence, clinics, toilets, isolation area, sale yard	Incinerator	Current structure in good place but require repair
i idbasweiii	vvajii	Occorridary	Jaio yara	Water truff, water tank fence, loading	Toquito Topuii
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Lagbogol	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
			-	Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Hadado	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure

				Water truff, water tank fence, loading ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Athibohol	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
	- 7	- r		Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Garsegoftu	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
				clinics, toilets, isolation area, sale	
Arbajahan	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
0 :4				clinics, toilets, isolation area, sale	
Griftu	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
				Water truff, water tank fence, loading	
				ramp, shelters, Offices, stalls, fence,	
Tulotulo	Moiir	Open bush	None	clinics, toilets, isolation area, sale	Looks market infrastructure
Tulatula	Wajir	Open bush	None	yard, weight balance, incinerator	Lacks market infrastructure
			Motor truff water		Water truff not functional as the
			Water truff, water		water piping has not been connected
			tank, fence, loading ramp, shelters,		The structures are generally in
			Offices, stalls, fence,	Shelter, weight balance	good condition.
			clinics, toilets,	Sheller, weight balance	Separation pens and loading
			isolation area, sale		ramp are reinforced with steel
			yard		Fence made of concrete and
Saylada	Moyale	Secondary	, ,		reinforced with steel.

ANNEX 6: TRADE ROUTES Cluster 1

Route	Source market	Destination markets	Mode
Kerio-Lodwar	Kerio	Lodwar	Trucking/Trekking
Moroto-Lokiriama	Moroto markets	Lokiriama	Trucking/Trekking
Lodwar-Lochwar-Lokichar	Lodwar	Lokichar	Trucking/Trekking
Katilu-Lokichar	Katilu	Lokichar	Trucking/Trekking
Lokori-Lokichar	Lokori	Lokichar	Trucking/Trekking
West Pkot-Kalemngorok- Lokichar	West Pokot	Lokichar	Trucking/Trekking
Lokori-Katilia-Lokichar	Lokori, Katilia	Lokichar	Trucking/Trekking
Lolachat-Iliri	Lolachat	Iliri	Trekking
Kalapata-Lomorutae	Kalapata area	Lomorutae	Trekking
Turkana-Loyoro-Lomorutae	Turkana markets	Loyoro,Lomorutae	Trekking
Lotukei(SSD)-Lomorutae	Lotukei	Lomorutae	Trekking
Naitakwei-Kobebe-Lokiriama	Naitakwei	Lokiriama	Trekking
Naitakwei-Kodonyo-Amudat- WestPokot	Naitakwei	Amudat TC,West Pokot markets	Trekking
Amudat TC-Alakas-Kiwawa	Amudat TC	Westpokot markets	Trekking
Kiwawa-Alakas-Amudat TC	Westpokot markets	Amudat TC	Trekking
Turkana-Amudat TC	Turkana markets	Amudat TC	Trekking
Amudat TC-Karita	Amudat TC	Karita	Trekking

Karita-Orolwo-Kacheliba	Karita	Orolwo,Kacheliba	Trekking
Kacheri,Rengen,Nakapilemoru, Panyangara-Kanarwat	Kacheri,Rengen,Nakapilemoru,Panya ngara	Kanarwat	Trekking
Kacheri-Rengen	Kacheri	Rengen	Trekking
Rengen-Kacheri	Rengen	Kacheri	Trekking
Lorengae-Lolachat	Lorengae	Lolachat	Trekking
Chepsukunya-Ngenge	Chepsukunya	Ngenge	Trekking
Chemamul-Ngenge	Chemamul	Ngenge	Trekking
Kamila-Amudat	Kamila	Amudat TC	Trekking
Kamila-Konyao-Amudat	Kamila	Amudat	Trekking
Konyao-Orolwo-Kacheliba- Kitakapel-Kishaunet	Konyao	Kishaunet	Trekking
Kacheliba-Chepkobegn	Kacheliba area	Chepkobegn	Trekking
Chepkobegn-Ortum	Chepkobegn	Ortum	Trekking
Ortum-Chepareria	Ortum	Chepareria	Trekking
Kacheliba-Chepareria	Kacheliba	Chepareria	Trekking
Sigor-Ortum	Sigor	Ortum	Trekking
Chepareria-Kishaunet	Chepareria	Kishaunet	Trekking
Konyao-Orolwo	Konyao	Orolwo	Trekking
Kacheliba-Kishaunet	Orolow,Kacheliba	Kishaunet	Trekking
Amudat-Kamila	Amudat	Kamila	Trekking

Kanayarkwat-Cheptuya- Kishaunet	Kanyarkwat,Cheptuya	Kishaunet	Trekking
Chepkobegn-Kacheliba	Chepkobegn	Kacheliba	Trekking
Bubua-Illiret	Bubua	Illiret	Trekking
Hado-Bubua	Hado	Bubua	Trekking/Trucking
Bubua-Hado	Bubua	Hado	Trekking/Trucking
Omurate-Loarengal	Omuratae	Loarengak	Trekking/trucking
Mbale-Tororo		Tororo	Trucking
Lomorutae-Kitgum	Lomorutae	Kitgum	Trucking
Kitgum-Lomorutae	Kitgum	Lomorutae	Trucking
Naitakwei-Kongole-Iliri-Katakwi- Soroti	Naitakwei	Iliri,Katakwi,Soroti	Trucking
Naitakwei-Namalu	Naitakwei	Namalu,Mbale	Trucking
Moroto-Amudat TC-Mbale- Tororo	Moroto	Amudat TC	Trucking
Nakapiripirit-Amudat TC- Kapenguria-Nairobi	Nakapiripirit,Amudat TC	Kapenguria,Nairobi	Trucking
Mbale-Bukedea	Amudat TC,Karita, Moroto markets	Bukedea	Trucking
Amudat TC-Karita-Mbale	Amudat TC,Moroto	Karita, Mbale	Trucking
Karita-Bukwo	Karita	Bukwo	Trucking
Namalu-Karita-Kapchorwa- Bukwo	Namalu	Kapchorwa,Bukwo	Trucking
Kanarwat-Abim-Amuria-Soroti-	Kanarwat	Abim,Amuria,Soroti,Mbale,Ent	Trucking

Mbale-Entebbe		ebbe	
Kavheri-Lira	Kacheri	Lira	Trucking
Kacheri-Abim-Soroti	Kacheri	Abim,Soroti	Trucking
Soroti-Kumi-Bukedea-Mbale	Kotido markets	Mbale,Kumi,Bukedea	Trucking
Mbale-Palisa	Kotido markets	Palisa	Trucking
Panyangara, Kacheri-Abim-Lira	Panyangara, Kacheri	Abim,Lira	Trucking
Panyangara, Nakapilemoru- Abim	Panyangara, Nakapilemoru	Abim	Trucking
Lolachat-Bukedea	Loaclly,lorengae,kakomgorok	Bukedea	Trucking
Sironko-Mbale	Nakapiripirit	Mbale	Trucking
Namalu-Sironko-Mbale	Namalu	Sironko,Mbale	Trucking
Namalu-Bukedea	Namalu	Bukedea	Trucking
Lolachat-Sironko	Lolachat	Sironko	Trucking
Binyiny TC,Chemamul- Kapchorwa-Bulambuli	Binyiny TC, Chemamul	Kapchorwa,Bulambuli	Trucking
Binyiny TC-Kitale	Binyiny TC	Kitale	Trucking
Namalu-Chepsukunya	Namalu	Chepsukunya	Trucking
Mbale-Butaleja	Moroto markets,Amudat TC	Butaleja	Trucking
Mbale-Jinja-Kampala	Kotido markets,	Jinja,Kampala	Trucking
Mbale-Entebbe	Kotido markets	Entebbe	Trucking
Mbale-Busia	Kotido markets	Busia	Trucking

Palisa-Kampala	Moroto markets	Kampala	Trucking
Lokales-Karita-Chepsukunya- Mbale-Bukedea	Lokales,Karita	Mbale, Bukedea	Trucking
Cheptuya/Kishaunet/Ortum/Lo mut-Kimilili-Chwele-Bumala	Cheptuya,Kishaunet,Ortum,Lomut	Bumala,Chwele,Kimilili	Trucking
Kishaunet-Athi River, DagorettiNairobi	Kishaunet	Nairobi	Trucking
Chepareria-Kitale	Ortum	Kitale	Trucking
Kitale-Eldoret	Chepareria,Ortum,Chepkobegn,Kisha unet,Kacheliba	Eldoret	Trucking
Kishaunet-Kitale-Bumala- Chwele-Bungoma	Kishaunet	Bunala,Chwele,Bungoma	Trucking
Kitale-Tranzoia	Chepareria	Kitale,TransNzoia	Trucking
Chepareria-Athi River, Dagoretti, Nairobi	Chepareria	Nairobi ,Dagoretti, Athi River	Trucking
Lomut-Sigor-Ortum-Chepareria	Lomut,Sigor	Chepareria	Trucking
Eldoret-Kakamega	Westpokot markets	Kakamega	Trucking
Cheptuta-Kanayarkwat- Chwele-Kiminini	Cheptuya,Kanayarkwat	Kiminini,Chwele	Trucking
Kakuma-Lokichoggio	Kakuma	Lokichoggio	Trucking
Ororpoi-Kalobey-Kakuma	Oropoi,Kalobey	Kakuma	Trucking
Lokiriama-Kakuma	Lokiriama, Naitakwei	Kakuma	Trucking
Lodwar-Lokiriama	Lodwar	Lokiriama	Trucking

Kanagten-Mojo	Kanagten	Mojo	Trucking
Omuratae-Keyafer-Mojo	Omuratae	Keyafar,Mojo	Trucking
Kangamaten-Konso	Kangamaten	Konso	Trucking
Akobo-Dima	Akobo	Dima	Trucking
Kibish-Dima	Kibish	Dima	Trucking
Lomorutae-Kotido	Lomorutae	Rengen,Nakapilemoru,Panyan gara,Kacheri	Trucking/Trekking
Bira-Lomorutae	Bira(SSD)	Lomorutae	Trucking/trekking
Naitakwae-Kotido	Naitakwei	Rengen,Nakapilemoru,Panyan gara,Kacheri	Trucking/Trekking
Kotido-Naitakwei	Kotido markets	Naitakwei	Trucking/Trekking
Nakapiripirit-Amudat TC	Nakapiripirit	Amudat TC	Trucking/Trekking
Karita-Kacheliba	Karita	Kacheliba	Trucking/Trekking
Karita-Namalu	Karita	Namalu	Trucking/Trekking
Moroto-Kangole-Matany- districts in Teso and Lango subregions	Kangole, Moroto	Teso.Lango	Trucking/Trekking
Amudat TC-Naitakwae	Amudat TC	Naitakwae	Trucking/trekking
Chepkobegn-Chepareria	Chepkobegn	Chepareria	Trucking/Trekking
Kishaunet-Chepareria	Kishaunet	Chepareria	Trucking/Trekking
Lomut-Sigor-Turkana	Lomut	Turkana	Trucking/Trekking
Turkana-Sigor-Lomut	Turkana	Sigor	Trucking/Trekking

Lokichoggio-South Sudan	Lokichoggio	South Sudan	Trucking/Trekking
Letea-Kakuma	Letea,Kaabong	Kakuma	Trucking/Trekking
Lodwar-Nasiger-Naduat- Kakuma	Lodwar, Nasiger, Naduat	Kakuma	Trucking/Trekking
Nadwat-Kakuma	Nadwat	Kakuma	Trucking/Trekking
Kanakurdio-Kakuma	Kanakurdio	Kakuma	Trucking/Trekking
Kaeris-Kakuma	Kaeris	Kakuma	Trucking/Trekking
Kaaleng-Lodwar	Kaaleng	Lodwar	Trucking/Trekking
Kaikor-Kaeris-Kakuma	Kaikor,Kaeris,Kibish	Kakuma	Trucking/Trekking
Lokitaung-Kaaleng	Lokitaung	Kaaleng	Trucking/Trekking
Lokitaeng-Kaaleng-Kaeris- Kakuma	Kaaleng,Lokitaeng,Kaeris	Kakuma	Trucking/Trekking
Loreangarak-Kalokol	Loreangarak	Kalokol	Trucking/Trekking
Kalokol-Lodwar	Kalokol	Lodwar	Trucking/Trekking
Kibish-Kaikor	Kibish	Kaikor	Trucking/Trekking
Loitaung-Lodwar	Lokitaung	Lodwar	Trucking/Trekking
Kaeris-Kanakurdio-Nadwat- Nasiger	Kaeris,Kanakurdio,Nadwat,Nasiger	Lodwar	Trucking/Trekking
Kangirisae-Nakoret-Nakurio- Kerio-Lodwar	Kangirisae,Nakoret,Nakurio	Kerio,Lodwar	Trucking/Trekking
Lokiriama-Namorupus- Lorugum-Loima-Lodwar	Lokiriama,Namorupus,Lorugum,Loim a	Lodwar	Trucking/Trekking
Lokiriama-Moroto-Kampala	Lokiriama	Moroto,Kampala	Trucking/Trekking

Turkwell-Lodwar	Turkwell	Lodwar	Trucking/Trekking
Lokiriama-Lokichar	Lokiriama	Lokichar	Trucking/Trekking
Lokichar-Lochwar-Lodwar	Lokichar,Lochwar	Lodwar	Trucking/Trekking
Lokori-West Pokot	Lokori	West Pokot	Trucking/Trekking
Lomut-Nairobi	Lomut	Nairobi	Trucking/Trekking
Lodwar-Nairobi	Lodwar	Nairobi	Trucking/Trekking
Lokichar- Ortum,Nairobi,Mogotio,Eldoret, Kitale	Lokichar	Ortum,,Nairobi,Mogotio,Eldoret ,Kitale	Trucking/Trekking
Lokiriama-Loruugum-Turkwell- Lodwar	Lokiriama	Lodwar	Trucking/Trekking
Lomuratae-Gulu	Lomuratea	Gulu	Trucking/Trekking
Kibish-Jeba if Bero woreda	Kibish	Bero	Trucking/Trekking
Hado-Omuratae	Hado	Omuratae	Trucking/Trekking

Cluster 2

Source markets	End markets	Route
Kargi	Marsabit, Nairobi	Kargi-Marsabit-Merile-Nairobi
N. Horr	Maikona, Nairobi	N. Horr-Kalacha-Maikona-Nairobi
N. Horr	Ethiopia	N. Horr-Ethiopia
Turbi	Nairobi	Turbi-Marsabit-Nairobi
Turbi	Ethiopia	Turbi-Ethiopia
Forole	Nairobi	Forole-Maikona-Marsabit-Nairobi
Illaut	Merile	Illaut-Merile

Illaut	Wamba area	Illaut-Wamba
Kalacha	Marsabit, Nairobi	Kalacha-Marsabit
Kalacha	Ethiopia	Kalacha-Ethiopia
Korr	Merile, Nairobi	Korr-Merile-Nairobi- Kariobangi
Moyale	Isiolo, Nanyuki, Nairobi, Meru	Moyale-Isiolo-Nanyuki-Meru, Nairobi
Merile, Marsabit, Kargi	Isiolo, Nairobi	Marsabit-Merile-Isiolo-Nairobi
Saru	Dilo livetsock markets	Saru-Ethiopia markets
Olturot	Baragoi, Maralal, Nairobi	Olturot-Baragoi-Maralal
Olturot	Marsabit, Nairobi	Olturot-Marsabit-Nairobi
Maikona	Ethiopia	Maikona-Ethiopia
Sololo	Ethiopia	Sololo-Ethiopia
Dilo	Dukana	Dilo-Dukana
Dilo	Dubluk	Dilo-Dubluk
Dilo	Forole	Dilo-Forole
Dubluk, Mega, Magado	Adama, modjo, Addis ababa, Moyale(ETH)	Moyale-Mega-Dubluk-Yabelo-Adama-Mojo-Adama- Addis
Boku, Hidilalo	Moyale, Marsabit, Nairobi	Boku, Hidilalo-Moyale-Marsabit-Nairobi
Dukana	Dilo	Dukana-Ethiopia
Dukana, Ethiopia	Marsabit, Nairobi	Dukana-North Horr-Marsabit
North horr, Loyiangalani- Illaut	Lolkuliani(wamba)-Nairobi	North Horr-Loyiangalani-Illaut-Wanba-Nairobi
North Horr	Olturot	North horr- Olturot
Olturot	Lolkuliani(Wamba)	Olturot-Illaut
Moyale	Isiolo, Nairobi	Moyale-Arbajan-wajir-Merti-Isiolo-Nairobi
Illeret	North horr	Illeret-North Horr
Forole,	Ethiopia	Forole-Magado
Magado, Forole	Mega,	Magado-Mega
Dilo	Dubluk,Mega	Dilo-Mega-Dubluk
Elwaye	Addis ababa	Elwaye-Yabelo-addis ababa

Hidilalo	Mega.	Hidilola-Mega
Illaut	Isiolo, Nairobi	Illaut-Laisamis-Merile-Isiolo-Nairobi
Moyale	Ethiopian border markets	Moyale-Ethiopia
Tuka	Boku	Tuka-Boku
Tuka	Moyale	Tuka-Moyale
Hidilalo	Boku	Hidilalo-Boku
Tuka	Sololo	Tuka-Sololo
Godoma	Moyale	Godoma-Moyale(KEN)

Cluster 3

Route	Source	Destination	
Arbaqeraso-Wajir	Arbaqeraso	wajir market	
Riba-Wajir	Riba	wajir	
Khorof-Elwak	Khorof	Elwak somalia	
Khorof-Wajir	Khorof	wajir	
Kutulo-Nairobi	Kutulo	Nairobi	
Wargadud-Wajir	Wargadud	wajir	
Tarbaj-Wajir	Tarbaj	wajir	
Elben-wajir	Elben	wajir	
Dambas-wajir	Dambas	wajir	
Mansa-wajir	Mansa	wajir	
Ogarale-Wajir	Oragale	wajir	
Basanaja-wajir	Basanaja	wajir	

Basanaja-Moyale	Basanaja	Moyale	
Basanaja-Elwak	Basanaja	Ilwak(Somalia)	
Dunto-wajir	Dunto	wajir	
Batalu-Wajir	Batalu	wajir	
Ajawa-Bute	Ajawa	Bute	
Ajawa-Moyale	Ajawa	Moyale	
Bute-Moyale	Bute	Moyale Kenya	
Bute-Moyale	Bute	Moyale Ethiopia	
Bute-Moyale	Bute	Moyale Kenya	
Gurar-Moyale/Bute	Gurar	Moyale/Bute	
Adadijole-Moyale/Bute	Adadijole	Moyale/Bute	
Hote-moyale	hote pastrolist	Moyale	
Hote-Dabel	hote pastrolist	Dabel	
Hote-Korondile	hote pastrolist	Korondile	
Korondile-Moyale	Korondile	Moyale	
Buna-Moyale	Buna	Moyale	
Buna-wajir	Buna	wajir	
Buna-Nairobi	Buna	Nairobi	
Anole-Eldas	Anole	Eldas	
Anole-wajir	Anole	wajir	
Eldas-Wajir/Nairobi	Eldas	wajir-Nairobi	

Eldas-Moyale	Eldas	Moyale
Eldas-Burajey	Eldas	Burajey
Elnur	Elnur	wajir
Elnur	Elnur	wajir
Wagalla	wagalla	wajir
Wagalla	wagalla	Nairobi
Wagalla	wagalla	wajir
wajir central	wajir	wajir-Nairobi
wajir central	wajir	Somalia, Moyale, Nairobi
wajir central	wajir	Nairobi
Khorkar-Dagahley	Khokar	Dagahley
Khorkar-Lagbogol	Khokar	Lagbogol
Khorkar-Wajir	khokar	Wajir
kursin-wajir	kursin	wajir
kursin-Garissa	Kursin	garissa
Kursin-lagbogol	kursin	Lagbogol
Kursin-Habaswein	Kursin	Habaswein
Dalsan-Darfur	Dalsin	Darfur
Diif-wajir	Diff	Wajir
Diif-Darfur	Diff	Darfur
Diff-Kismayu	Diff	Kismayu

Diif-Mugadisho	Diff	Mugadisho
Diif-Garissa	Diff	Garissa
Burder-wajir	Burder	Wajir-Dagahley
Burder-Garissa	Burder	Wajir-Dagahley
Burder-Dagahley	Burder	Wajir-Dagahley
Dadajabulla-Kismayo	Dajabula- shoats/camels,cattle	kismayo
Dadajabulla-Nairobi	Dajabula- shoats/camels,cattle	Nairobi
Dadajabulla-Mombasa	Dajabula- shoats/camels,cattle	Mombasa
Dadajabulla-Darfur	Dajabula	Darfur
Sarif-darfur	Sarif	Darfur
Sarif-Garissa	Sarif	garissa
Sebule-Dagahley	Sebuli	Dagahley
Sebule-Garissa	Sebuli	garissa
Biyamathow-Dagahley	Biyamathow- shoats,camels,cattle	Dagahley
Biyamathow-Mombasa	Biyamathow- Cattle	Mombasa
Biyamathow-Nairobi	Biyamathow- shoats	Nairobi
Biyamathow-Garissa	Biyamathow	Garissa
fini-Dagahley	Fini	Dagahley
Dilmanyale-Garissa	Meri- shoats,cattle	Garissa
Dilmanyale-H/wein	Dilmanyale- cattle,shoats,camel	Habaswein
Dilmanyale-Dagahley	Dilmanyale- camel	Dagahley

machesa-Dagahley	Machesa	Dagahley
machesa-wajir	Machesa	wajir
machesa-Nairobi	Machesa	Nairobi
Salelma-Darfur	Salelma	Darfur
salelma-wajir	salelma	wajir
Abakore	Abakore-cattle,shoats,camel	Kariobangi
Abakore-Garissa	Shoats,cattle,camel	garissa
Habaswein-Garissa	shoats,cattle	garissa
Habaswein-Isiolo	shoats,cattle	Isiolo
H/swein-Mombasa	shoats,cattles	Mombasa
H/swein-Nairobi	shoats,cattles	Nairobi
Hadado-wajir	Hadado-cattle,shoats,camel	wajir
Hadado-Nairobi	Hadado-cattle,shoats,camel	Nairobi
Hadado-Habaswein	Hadado-cattle,camel	Habaswein
Lagbogol-Nairobi	Lagbogol-shoats	Nairobi
Lagbogol-Moyale	Labogol-sheep	Moyale
Lagbogol-Mombasa	Lagbogol-goats	Mombasa
Lagbogol-Isiolo	Lagbogol-camels	Isiolo
Lagbogol-wajir	Lagbogol-camels	wajir
Garse-wajir	Garsegoftu-camels	wajir
Garse-Nairobi	Garsegoftu-shoats	Nairobi

Athibohol-wajir	Athibohol-cattle,camel	wajir
Athibohol-Nairobi	Athibohole-shoats	Nairobi
Athibohol-Moyale	Athibohole-camels	Moyale
Tulatula-wajir	Tulatula-shoats	wajir
Tulatula-Nairobi	Tulatula-shoats	Nairobi
Griftu-Nairobi	Griftu-shoats	Nairobi
Griftu-Wajir	Griftu-camels,shoats,cattle	wajir
Dadajabala-Diff	Dadadjabal	Diff
Sarif-Dadajabla	Sarif	Dadajabala
Bimathow-Sarif	Biamathow	Sarif
Sarif-Sebule	Sarif	Sebule
Meri, Fani, Dalsan-Wajir TM	Meri Fani, Dalsan	Wajir TM
Dilmanyale-Abakore-Meri	Dilmanyale	Meri
Kursin-Machesa-Sarif	Kursin	Sarif
Habaswein-Wajir	Habaswein	Wajir
Wajir T-Logbogol	Wajir T	Logbogol
Habaswein-Hadado	Habaswein	Hadado
Wajir Bor-Albaqeramso-Wajir T	Wajir Bor	Wajir town market
Arbajah-Garsegoftu-Athibolol	Arbajaha	Athobohol
Korondile-Wajir	Korondile	Wajir

Athibohol-Wajir	Athibohol	Wajir
Korodile-Buna-Makhagufu- Eldas-Anole-Griftu-Wajit Town	Korodile	Wajir Town
Buna-Bute	Buna	Bute
Kalikilo-Bute	Kalakilo	Bute
Dunto-Ajawa-Bute	Dunto	Bute
Dunto-Wargadud	Dunto	Wargadud
Dunto-Dambasa-Elbebu	Dunto	Elbebu
Bute-Saylada	Bute	Saylada
Griftu-Moyale	Griftu-camel,buck rams	Moyale
Arbajahan-Nairobi	Arbajahan- shoats	Nairobi
Arbajahan to wajir	Arbajahan-shoats, camel	wajir
Rhamu-Mandera	Rhamu	Mandera
Rhamu-Khalalio	Rhamu	Khalalio
Guba-Rhamu	Guba	Rhamu
Rhamu-Ethiopia	Rhamu	Ethiopia
Takaba-Guba	Takaba	Guba
Takaba-Ajawa	Takaba	Ajawa
Dandu-Takaba	Dandu	Takaba
Eymole-Banissa	Eymole	Banissa

Banissa-Eymole	Banissa	Eymole
Sake-Moyale(ETH)	Sake	Moyale(ETH)
Shimbir Fatuma-Wargadud	Shimbir Fatuma	Wargadud
Elwak-Somalia markets	Elwak	Somalia markets
Wargadud-Elwak	Wargadud	Elwak
Elwak-New Kotulo	Elwak	New Kotulo
Bute- Saylada	Bute	Saylada
Eymole-Moyale woreda markets	Eymole	Moyale woreda markets
Burduras-Moyale woreda markets	Burduras	Moyale woreda markets