

**Annex XIV**



**THE EAST AFRICAN COMMUNITY**

**EAC LIVESTOCK POLICY**

**EAC SECRETARIAT  
Arusha, Tanzania  
May, 2014**

**EAST AFRICAN COMMUNITY**

# **LIVESTOCK POLICY**

*Transformative Livestock Development*

**May, 2014**  
**Arusha, Tanzania**

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## **ACKNOWLEDGEMENT**

## LIST OF ACRONYMS

ASAL	Arid and Semi-Arid Lands
ASDS	Agriculture Sector Development Strategy
ASF	Agriculture Sector Frameworks
ASRAECA	Association for strengthening Agriculture Research in Eastern and Central
AU	African Union
AU-IBAR	African Union -InterAfrican Bureau of Animal Resources
BSE	Bovine Spongiform Encephalopathy
CAADP	Comprehensive Africa Agriculture Development Program
CARDF	Common Agriculture and Rural Development Fund
CBO	Community Based Organization
CBPP	Contagious Bovine Pleuropneumonia
CCPP	Contagious Caprine Pleuropneumonia
EAC	East Africa Community
EAC –ARDP	East African Community –Agriculture and Rural Development Policy
ECF	East Coast Fever
FAO	Food and Agriculture Organisation
FMD	Foot and Mouth Disease
GDP	Gross Domestic Product
HPAI	Highly Pathogenic Avian Influenza
IGAD	Intergovernmental Agency for Development
ILRI	International Livestock Research Institute
IMF	International Monetary Fund
LEWS	Livestock Early Warning Systems
LMD	Livestock marketing Division
LSDS	Livestock Sector Development Strategies
MDG	Millennium Development Goals
NARS	National Agricultural Research Systems
ND	Newcastle Disease
NGO	Non Governmental Organisation
PES	Payment for Environmental Services
PMA	Plan for Modernisation of Agriculture
PRSP	Poverty Reduction Strategy Papers
PSTA II	Strategic Plan for the Transformation of Agriculture in Rwanda
RVF	Rift Valley Fever

SAP	Structural Adjustment Programs
SME	Small Medium Microenterprise
SMME	Small Medium and Micro Enterprises
SSA	Sub Saharan Agriculture
TPM	Top Policy Management
WB	World Bank

## **Executive Summary**

The EAC secretariat has developed this livestock policy to foster focused and coherent set of strategic policy decisions and actions relevant to propelling and transforming EAC Partner States Livestock industry beyond the outcomes attained with the past and current livestock subsector policy instruments. The goal of EAC livestock policy is to attain an annual growth rate of at least 5.0% with significant livestock contribution to the agricultural GDP surpassing 50% and to contribute to the reduction of poverty, hunger, unemployment and degradation of natural resources.

Attainment of this goal is anchored on four policy objective pillars, namely:

- a) Securing access to basic production inputs and security to stimulate productive use of livestock assets,
- b) Building resilience to risks and shocks to secure livestock assets,
- c) Enhancing growth in livestock productivity and competitiveness for livelihood benefits, and
- d) Sustaining growth in livestock productivity and competitiveness adaptable to dynamics in the livestock value chains.

Within each objective, policy issues requiring action are clarified. The document then outlines the specific objectives and corresponding policy instruments and strategies for implementation to transform the EAC livestock subsector into a vibrant livestock industry contributing significantly to improved living standards of citizens, economic growth and sustainable natural resources management. The specific policy objectives within each objective pillar are:

Policy objective 1: Securing access to basic production inputs and security

- a) To enhance secure access to land resources.
- b) To enhance secure access to water resources.
- c) To enhance secure access to feed resources.
- d) To enhance productive utilisation of pastoral livestock assets.
- e) To enhance security situation for livestock assets.

Policy objective 2: Building resilience in livestock systems to risks and shocks

- a) To reduce vulnerability in livestock systems.
- b) To build adaptive capacities to climate change.
- c) To provide mechanisms for coping with food price volatility.

Policy objective 3: Enhancing growth in livestock productivity and competitiveness

- a) To strengthen delivery and governance of veterinary health services.
- b) To enhance access to quality extension services.
- c) To promote information sharing.
- d) To enhance access to quality breeding stock.
- e) To enhance wider application and benefits of biotechnology.
- f) To enhance secure access to financial services and products

Policy objective 4: Sustaining growth in livestock productivity and competitiveness

- a) To promote gender equity, youth participation and HIV and Aids awareness.
- b) To promote livestock market functioning and trade.
- c) To enhance food and feed quality and safety.
- d) To strengthen research in livestock subsector.
- e) To enhance conservation and sustainable utilisation of livestock resources.
- f) To enhance contribution of livestock to ecosystem productivity.
- g) To enhance access to affordable energy.

Implementation of the policy instruments and strategies aims at achieving specific objectives and in turn, a set of targets defined on the basis of outcomes in the various development frameworks guiding overall development of the regional agriculture. The priority targets by 2030 are:

- a) Increase in the annual growth rate in livestock production by more than 5.0 percent to spur 10 percent economic growth targeted by Partner States,
- b) Increase in productivity and value of the multiple functions of livestock to more than 60%,
- c) Reduce degradation of the ecosystems supporting livestock assets by over 50%,
- d) Increase in the contribution of livestock to the GDP of the Partner States to reach over 55 percent of the Agricultural GDP,
- e) Reduction of the proportion of livestock dependent people living below the absolute poverty line and food insecure from 60 percent to less than 25 percent, to achieve the first MDG,
- f) Increase in public investment in livestock subsector to at least 3% of the total annual budget,

- g) Divestiture in all state corporations dealing with production, processing and marketing of livestock and livestock products that can be better done by the private sector,
- h) Reform and streamline supportive services and regulatory frameworks, and
- i) Secured conservation of local animal genetic resources.

Application and implementation of the EAC livestock policy shall be within the scope of the EAC Treaty Articles that mandate collective actions by Partner States on: Livestock resource development (Article 105 part 1 and part 2), Environment and Natural resources (Article 114) and Common Market Protocol including the broader agriculture sector (Article 45).

The Policy document is organized into six chapters. Chapter one presents the policy context and rationale while chapter two reviews performance of the livestock subsector and chapter three outlines the priority development objectives for harnessing significant livestock contributions to improved living standards of citizens, economic growth and sustainable natural resources management. Policy Goals and Scope are defined in chapter four with chapter five focusing on the policy objectives and instruments selected for implementation towards realising the policy objective pillars.

Lastly, chapter six is dedicated to institutional and governance frameworks for implementation of the policy. Central to policy implementation is EAC Secretariat working with Partner States to prepare a national master plan of action and implementation strategy to roll out the EAC livestock policy in their national livestock programmes. The national master plans will detail implementation timeframe, specific actions, investments, responsible actors and the measurable indicators of progress for Monitoring and Evaluation towards achievement of the policy objectives and targets.

## **1. POLICY CONTEXT AND RATIONALE**

### **1.1 Commitment of Partner States to Invest Resources in Livestock Development**

The EAC Partner States comprising the Republics of Burundi, Kenya, Rwanda, United Republic of Tanzania and Republic of Uganda are deepening their co-operation in political, economic, social and cultural integration. Their overarching goal is to become an industrialised, middle-income economic bloc able to provide sustainable high standards of living to all citizens. This is the vision also of Africa in 50 years' time, envisaging transformation of fragile and vulnerable African economies into more robust and developed markets, creating opportunities for the poor and leading to peaceful, stable and vibrant societies.

On a common path to this goal, the Partner States consider policy harmonisation process important for prioritising development interventions and sustainably expanding economic activities in the productive sectors. One area of policy harmonisation is in agriculture, which is a priority sector with high potential to generate outputs for both domestic and export markets and for increasing per capita incomes of majority of the citizens. Agriculture features prominently within the EAC economic co-operation because it dominates the economy of each of the five Partner States. In each of these Partner States, attaining food security status has remained elusive and therefore is a priority in the development agenda in the EAC.

At national level, the EAC Partner States are already implementing common agricultural policies and specific livestock policies in some Partner States. At the regional level, the Partner States are implementing the EAC Agricultural and Rural Development Policy and Strategy (EAC- ARDP & S), 2006). The goal of this policy therefore, is to attain food security and rational agricultural production through increased agricultural production, processing, storage and marketing. EAC Partner States are aligning their national agricultural development instruments to continental and global food policy frameworks. In this policy alignment, livestock development policies are being informed by the Comprehensive Africa Agriculture Development Program (CAADP) and the AU Policy Framework for Pastoralism. The alignment of this policy is undertaken through policy reviews, Investment Plans (IP) and increased budgetary allocation to agriculture sector from below 5% to 10% of the national budget in line with the Maputo Declaration by AU Heads of States and Governments which requires that 10% of the national budget of AU Member States be allocated to agriculture, of which a minimum of 3% should be to the livestock sector.

## **1.2 Livestock Contribution to Poverty and Hunger Alleviation**

Livestock makes a disproportionately higher contribution to income and welfare of the households keeping livestock. Estimates are that over 70%, of the livestock resources are owned by smallholder and pastoral households who are also experiencing high levels of poverty and hunger incidences. The majority of these people own at least one or two species of livestock and attach high value due to the multiple functions of the latter.

Though livestock supports livelihoods of a large proportion of the population, over 60% of households keeping livestock are estimated to suffer from poverty and hunger. The African Development Bank projects that a dramatic decline in Africa's poverty would require the economy to grow at an average of 7% annually. Attaining this level of growth rate will be a challenge because the bank projects GDP growth for the EAC from 6.2% in 2010 to rise to 7.9% in 2020 and to 9.3% in 2030.

EAC has a goal of increasing the contribution of livestock to GDP of the Partner States because the annual growth rates in the real GDP is presently low, with Kenya recording the lowest at 2.6% in 2009 and Rwanda the highest at 6.1% in the same year. In 2010 Tanzania recorded the lowest with 3.4% followed by Burundi at 3.9% while Rwanda recorded the highest annual growth rates at 7.5% followed by Kenya and Uganda at 5.6%. In 2010, Livestock contributes an average of 10% of the GDP of EAC Partner States with proportional contribution of 9% in Burundi, 14.4% in Uganda, 15% in Kenya, 10% in Rwanda and 3.8% in Tanzania. The average contribution of livestock to the agricultural GDP is between 30 and 50% and has potential to surpass 50% over the next two decades because of growing consumption demand for animal-source foods.

Growth in consumption demand for animal-source foods is resulting from a growing population now estimated at 133.5 million people with annual growth rate highest in Uganda at 3.5% and lowest in Kenya at 1.3%. Growth in urbanization and increasing proportion of middle class population are other factors fueling demand growth in animal foods. Though the demand growth presents economic opportunities, appropriate pro poor livestock policies have to be in place to translate the opportunities into incentives and benefits for the poor livestock keepers and traders.

A large majority of livestock keeping households in the EAC Partner States are found in marginal areas where land quality show declining trend with continuing soil and water erosion, desertification and salinisation. The challenge to this, is in practicing appropriate land use and natural resources management to reverse the worsening trends, which require appropriate policies and strategies because of adverse implications on growth in the livestock subsector.

The objective of the EAC Agricultural and Rural Development Strategy policy is to increase production, productivity and market access. The priorities of this policy objective is to produce quality animals and animal products for regions' rapidly increasing human population and for export market, and reducing the impact of pests and diseases in order to promote sustainable production. This livestock development goal must support inclusive growth.. Increases in livestock production, productivity and market access that benefit a large population of livestock keepers and others in the value chain is needed in order to close the presently large inequality gaps. Inclusive growth in livestock subsector needs collective policies and strategies that promote reduction in poverty, degradation of natural resources and ecosystem services that support livestock assets, and directly empower livestock keepers and others in the value chain

### **1.3 The Need for EAC Livestock Sector Development Strategic Policy**

Agriculture and livestock related sector policies focus on increased access to improved livestock breeds, extension and veterinary services, access to credits and markets. The policies inadequately account for the needs and constraints of the livestock-dependent population for access to land, water, feeds and animal health services. Risk-coping and management support are emergency based rather than building resilience of livestock production in arid and semiarid lands. In these areas, frequent conflicts over scarce resources and wildlife-human-livestock interactions often lead to insecurity, which discourage investments in livestock. Growth in livestock development has not been sustained because the existing policies in livestock trade, food safety and quality, research and environment, are often restrictive and act as barriers to market participation of the livestock producers and traders.

Therefore, there is a need for a policy that will add value and build synergies to assist in harmonization and implementation of existing development livestock policies and strategies. The implementation of the EAC livestock policy in the medium to long term aims to build the

capacity of the communities to sustainably produce high quality livestock products in dynamic and increasingly demanding markets. Successful implementation of the policy will contribute to reduction of poverty, hunger, unemployment and sustained use of natural resources for livestock production.

#### **1.4 Link with the Existing EAC Development Frameworks**

Formulation of the EAC livestock policy was informed by several existing development policy frameworks in the EAC Partner States. These include: Agriculture and livestock sector policies and development strategies (LDS), Poverty Reduction Strategy Papers (PRSPs), other Agriculture Sector Frameworks, and the national development visions of the EAC Partner States.

At the regional level, this policy is linked and built on the EAC Agricultural and Rural Development Strategy (2005 -2030), the EAC Food Security Action Plan (2011 -2015), EAC Climate Change Policy, the EAC Development Strategy (2011 -2016), the EAC Strategy on Prevention and Control of Transboundary Animal and Zoonotic disease and EAC Industrialization Policy (2012 -2032). At the continental level, the policy is aligned to the Millennium Development Goals (MDG), the Comprehensive Africa Agriculture Development Program (CAADP), the African Union - InterAfrican Bureau for Animal Resources Strategic plan ((AU-IBAR 2010-14), the African Union Policy Framework for Pastoralism and Africa in 50 years' time which outlines the path to inclusive development.

## **2. PERFORMANCE OF THE LIVESTOCK SUBSECTOR**

### **2.1 Livestock Productivity**

The EAC has a large population of livestock estimated at 50.2 million cattle, 25.3 million sheep, 59.7 million goats, 3.1million camels, 6.3 million pigs and 120 million poultry. Other important animal species used for food and draught include: horses, donkeys, rabbits, ducks, turkeys, quails and bees. In addition there is an increasing importance on emerging livestock such as guinea fowls, crocodiles and ostriches.

Livestock resources makes significant economic contribution, presently estimated between 30% and 50% of the agricultural GDP and accounting for between 10% and 15% of the national GDP. There is the potential of livestock contribution surpassing 50% of the agricultural GDP, but this will be dependent on increased productivity. Livestock productivity (kg/animal/year) is currently low. The estimate for beef is 10.4, milk is 395.8, sheep and goat is 3.5, pig is 47.1, poultry meat is 1.4 and eggs are 2.6. With exception to milk, FAO estimates that these productivity levels are more than 40% below even the average attained in developing countries.

Higher productivity in milk is attributable to a relatively large population of dairy breeds in Kenya and to some extent in Uganda and Rwanda. Past increases in the aggregate value of livestock has been achieved through increases in livestock numbers but with marginal change in quality and productivity. Growth in livestock numbers has been higher in non-ruminants relative to ruminants. Implementation of livestock genetic improvement programmes remains weak with limited participation in performance recording to inform objective selection criteria.

The range of marketed livestock products is narrow and this is because of limited value addition in the value chains. Livestock production barely meets the domestic demands, fueled by rapid growth in human population, per capita incomes, urbanization and associated changes in dietary patterns of increasing urban middle class population. Consequently, there is limited surplus production for the export market.

The indigenous livestock breeds though more disease and pest resistant are generally of low productivity and commercial value attributable to their low genetic potential. Therefore, livestock development agencies promote the introduction and use of exotic livestock breeds

and crossbreeds. These actions aim at rapidly increasing milk and meat productivity, but have not always yielded the expected results because of low adaptability to stresses from pest and disease, feed scarcity, low managerial standards and climatic changes. Indigenous breeds are often better adaptable to low input systems for being more disease resistant, heat tolerant and have the ability to efficiently utilize poor quality feed resources. Therefore, these genetic sources need both to be conserved and engineered with the capacity to generate higher meat and/or milk outputs.

## **2.2 Utilisation of Livestock Resources**

Livestock are livelihood assets to many rural households and increasing the value of these assets is crucial to enhancing the contribution of livestock to poverty and hunger alleviation. The assets are natural, financial, physical, social and human capitals. Natural capital is represented by meat, milk, eggs, honey, bees wax wool, hides and skins, manure and agro industrial raw materials. The financial capital is in form of cash earnings, savings, financing and insurance roles. The physical capital involves draught power, while social capital are in form of buffer against risk, wealth, prestige, identity, friendship, gifts, marriage dowries and uses in festivities. Human capital is obtained through nutritional contribution to rural households' diets which is estimated to be 6 to 36% protein and 2 to 12% calories. This nutritional contribution has large benefits on child growth and cognition, prevention of malnutrition and on pregnancy outcomes which are especially important for quality of future human capital of young children.

Livestock therefore provides outputs of diverse values and uses. The values and uses of these outputs include subsistence consumption, direct supply of crop inputs - manure and draught power, cash income from livestock and its products in addition to savings and investment from herd size and quality of stock kept, social functions in bride price, wealth sharing and ceremonies.

Majority of smallholders, pastoralists and poor peri-urban households dependent on livestock, food and crop inputs are equally important as are subsistence consumption, savings and cash income. Multi-functional roles are of high value because the poor prioritize survival rather than production. The provision of livelihood services is of importance and needs policy support to remove bias to marketed production.

A livelihood based mapping of livestock production systems proposed by ILRI, FAO and the pro-poor Livestock Policy Initiative applies income ratio from livestock to crops as classification criterion to reflect livelihood patterns. The production systems in which livestock to crops income ratio is at least 4 are classified as pastoral systems, those with income ratio of 1 to 4 are classified agro-pastoral systems including ranching and income ratio less than or equal to 1 represent mixed farming systems. A fourth distinct system practiced in the peri-urban, termed "landless intensive system", mainly producing poultry and pig and limited volume of milk, can be included. This latter system is operated by relatively wealthier middle class households more concentrated in the peri-urban areas and has a relatively higher external input use, higher level of investment and greater market orientation.

Mixed farming together with pastoral and agro-pastoral systems remain the most important for food security and poverty reduction strategies. The contribution of pastoral, agro-pastoral and mixed farming livestock production systems to sustainable livelihoods of the people of EAC Partner States has remained below desirable levels of food and income security. Pastoral, agro-pastoral and smallholder systems are highly vulnerable to shocks of climate variability and change. Transformation from livelihood orientation into commercial orientation focuses on specialized commodities and remains low in these livestock production systems. Sustainable utilization and conservation of the livestock resources is critical in the efforts to enhance livelihoods of the poor people of EAC.

### **2.3 Impediments to Improved Livestock Performance**

The impediments to enhancing performance and growth of livestock that require strategic decisions and actions are:

- a) Insecure access to basic production resources;
- b) Weak delivery of and poorly sustained animal health, extension and research services;
- c) Weak and inadequate livestock information services;
- d) Policies irresponsive to development needs in the livestock subsector;
- e) Adverse agro-ecological conditions and insecurity; and
- f) Inaccessibility technologies and high energy costs for processing;

### **2.3.1 Insecure access to basic production resources**

Secured access to basic production resources of land, feeds and water is a prerequisite to investments in productive livestock production. Unsecured access and scarcity of land, feed and water resources are a cause of competition over resources often leading to conflicts and encouraging degradation of natural resources. Pastoral, agro-pastoral and mixed crop livestock farming households who account for a larger proportion of the livestock resources, utilise marginal rangelands prone to risks of climate change, insecurity and disease outbreaks. In the marginal lands, pastoralists neither own the land nor the pastures and water resources. In most of the marginal lands, pastoral households produce without guaranteed rights of access to land, grazing pastures and water. The consequences are discouraged investments, reduced efficiencies in distribution of the resources and degradation of ecosystem services that support livestock assets.

Labour for livestock production is often provided by family members who are generally without requisite knowledge, skills and professional competencies to apply innovations that would enhance productivity. The proportion of public funding dedicated to the livestock subsector is far below its contribution to national GDP in all the EAC Partner States. A target of at least 3% of the national budget has been proposed for the livestock sector in the CAADP framework in response to biased resource allocation in the agriculture sector.

### **2.3.2 Weak delivery of and poorly sustained animal health, extension and research services**

The animal diseases cause huge economic losses directly due to mortality and indirectly through slowed growth and production, decreased fertility and work output resulting from morbidity. Diseases with the highest impact on livestock in EAC region include Transboundary Animal Diseases (TADs) such as Contagious Bovine Pleuro-Pneumonia (CBPP), Rift Valley Fever (RVF), Newcastle disease, Foot and Mouth Disease (FMD), tick-borne diseases, Trypanosomosis and parasitic diseases. . Animal diseases particularly Trypanosomosis and Tick-borne diseases, present major impediments to livestock production in smallholder dairy, pastoral and agro-pastoral systems. In addition, ecto and endo parasites also pose a challenge to improved livestock production and productivity in the region.

Transboundary Animal Diseases (TADs) are diseases of economic importance as they affect trade in livestock and livestock products. Zoonoses and Emerging & Re-emerging Infectious

Diseases (EIDs) are of increasing threat to public health as they are associated with trade, urbanization and intensification. Traffic mobility of people and traded livestock commodities across borders and ecosystems fuel spread of any disease break. The risk of zoonoses is associated with the interaction between livestock-wild animals-humans, increased commercialization of wildlife habitats and consumption of bush meat. Climate change and variability is further accelerating the outbreaks of TADS, zoonoses and the EIDs.

The livestock- wildlife and environment management interface is a challenging management issue because the scope is restricted and more intense and problematic. With wildlife integration, competition for the scarce water and pastures, and disease transmission and predation lead to conflicts. Current observations on emerging and re-emerging diseases show that two thirds of the disease are emanating from wildlife resources due to interaction between livestock-wildlife and man.

Food and feed safety remains a challenge impacting on productivity and competitiveness of the livestock value chains in the EAC. Of importance is aflatoxin, which is natural toxicant restricting flow of animal feeds. Food and feed safety and quality regulations have significant economic consequences in terms of lost trade and enforcement costs. Solutions to food safety and quality require proactively integrated measures and coordinated actions including improving infrastructure and enhancing capacity for effective prevention and control.

Public investment remains insufficient in livestock research to help livestock-dependent poor respond both efficiently and sustainably to changing production, regulations and market conditions. Public services would still be essential, particularly in research and extension, legislation and policies, disease surveillance, public health, vaccine production, Transboundary Animal Diseases, livestock movement control and quality control of livestock inputs and products.

The extension approach that ensures modern technologies developed are transferred to farmers and are adopted and put to use is critical. The extension approach maybe demand driven with some guidance. Nevertheless majority of farmers and pastoralists in the region still need a lot of training and therefore demand approach should coupled with guidance to enhance demand for the new technologies for improved livestock keeping.

### **2.3.3 Policies irresponsive to developmental needs in the livestock subsector**

Failure in delivery systems, inadequate funding and weak institutional settings are priority issues for strategic decisions and actions. Institutions that offer supportive services like research, extension, marketing infrastructure and credit facilities have been less effective in satisfying the needs of community livestock keepers. The impact of these institutions on the poor remains low because of less understanding of the circumstances and realities under which the poor farming households operate. The departments of animal production and veterinary services and the ministries responsible of livestock development are weakly linked and uncoordinated both within and between the Partner States. This has impacted on service delivery and to a large extent contributed to emergency interventions failing to support the livelihoods and resilience of livestock dependent communities.

The absence of functioning marketing, processing and conservation infrastructure impedes the desired rate of growth in the livestock subsector. To a large extent, these have sustained informal markets in inputs and outputs and contributed to limited value addition, employment possibilities and economic incentives along the entire livestock value chains.

There is a huge gap between technology generation and utilisation for enhancing productivity and value of livestock production. There are technological options for enhancing livestock productivity when used in feeding, health, breeding and reproduction and value addition. However, their adoption has remained limited or their use is inadequate, inappropriate, and inefficient and the demand for them is low.

In all production systems except for intensive, feed supply is often insufficient both in quantity and quality, with low energy and protein contents. The agro-industry by-products are under-utilized despite their huge potential, and this can be attributed to poor utilisation of innovations that enhance their value in livestock feeding. In intensive meat and egg production, feed is externally sourced from the market, but malpractices are common and impacts on quality of the feeds.

The livestock sector has in the past been subjected to policies less supportive to livelihoods of livestock keeping households. Weak policy instruments have limited impact on informed decision, planning and implementation capacities and application of appropriate solutions. This arises from lack of accurate and detailed statistical information, weak linkages among research institutions, extension services, veterinary services and farmers within and between the Partner States.

Past and current policies have not appropriately directed strategic decisions and actions to fully tap the value of multi-functional roles of livestock. Policies implemented have restricted the mobility of pastoral communities in some of the Partner States. This ignores the reason of pastoral mobility to coping with high rainfall variability and pasture seasonality in the arid and semi arid lands.

Policies aiming at increasing production have not necessarily benefitted the livestock keepers and traders who are an extremely heterogeneous group and often, being poor, maximize a survival rather than a production, productivity and quality functions. Though the ongoing macroeconomic and institutional policies are likely to sustain an enabling market environment, livestock subsector policies are not adequately addressing the most binding impediment affecting poor livestock keepers and traders. National policy documents emphasize the importance of strategies to kick-start domestic markets, with a focus on input over output markets.

Livestock production in EAC Partner States remains largely confined to the rain-fed pasture based system with marked seasonal fluctuations. The dominant informal market is incapable of absorbing the increases in meat and milk production during the wet season supply when quantity and quality of pastures support high productivity. Equally, the informal sector has limited capacity to absorb stock off take available during drought periods, which would help reduce economic losses which farmers incur during the drought periods. Fluctuating supply of livestock commodities increases operational costs to producers and to processors. In seasons of low supply of commodities, they still have to maintain specialized processing and storage equipment operating below installed capacities. These seasonal supply fluctuations in livestock commodities are to a large extent attributable to limited installed capacities for processing, storage and value addition while the demand remains almost the same.

FAO estimates that post-harvest losses in the EAC livestock value chains is between 27 and 30% of the quantities of commodities produced. The loss represents huge waste of scarce input resources (soil, water, labour, seeds, and fertilizers). The losses incurred impede income generation along the livestock commodity value chains and deepen food and nutritional insecurity and hence rural poverty. The seasonal food supply and huge post-harvest losses along the value chains require policies that encourage increased investments in expanding

transport, storage, and processing, marketing, distribution and to bring food to consumers in the domestic and export markets.

Partner States have different approaches to policy formulation. While Uganda and Tanzania has had a commodity based approach to policy formulation, Kenya and Tanzania have taken a sector based approach, while Burundi and Rwanda have an integrated policy on agriculture sector wide. However, the main objective in all these policies is to increase production and productivity for domestic demand and surplus for export. On the other hand, there has been paradigm shifts in policy formulation by global development agencies like World Bank, FAO, CAADP, IGAD, OIE, WTO and AU-IBAR prioritizing and emphasizing pro-poor livelihoods with focus on reduction of poverty and degradation of natural resources. This policy shift is informed by past disjointed treatment of livestock production and poverty reduction.

Significant reforms are ongoing in delivery of financial, veterinary and extension services, but they weakly target reducing vulnerability to shocks and sustaining livestock productivity and competitiveness. This includes secure access to markets, production resources and supportive services. Security and conflict over scarce natural resources is a recurring problem which slows livestock development in the marginal areas supporting pastoral and agro-pastoral livestock production.

Policies adopting inclusive growth are needed that integrate the basics for production, kick-starting domestic livestock markets and sustaining and expanding livestock markets for the poor in addition to ensuring security. Consultation at higher levels among Partner States will be necessary to ease harmonization and implementation process of the EAC livestock policy.

#### **2.3.4 Adverse agro-ecological conditions and insecurity**

The impediments to livestock performance are agro ecology specific. These include recurring droughts, animal diseases, degradation of the environment, inadequate supportive services and infrastructure, insecurity and recurring ethnic conflicts over natural resources. All these impacts on livestock assets in arid and semi-arid zones where the impediments of importance are livestock population, declining soil fertility, scarcity of water and dry season feed resources. These are worsened by lack of supportive services and poor infrastructure for delivery of veterinary services, production, marketing and processing technologies.

Relative to other zones, the sub humid zones have greater opportunities for expansion of livestock production through technological interventions if supportive infrastructure is improved. The potential for poultry and pig production is hampered by the high cost of concentrate feed and lack of supportive infrastructure while distribution of the thermo-stable New Castle Disease vaccine is yet to benefit indigenous chicken producers on a wide-scale. Intensive livestock production is found in the highlands. Potential exists to increase meat and milk production through improvement of livestock productivity and modest increases in livestock numbers. Impediments to livestock production in this zone are: scarcity of land, unavailability of appropriate technologies and services, year-round feeding systems, high-yielding forages and feed crops, improved breeding stocks, effective veterinary services.

Across all the agro-ecological zones, adoption of climate-smart agriculture remains limited. This presents a setback to efforts for enhancing food production, resilience to climate change and reducing greenhouse gas emissions, degradation of natural resources and ecosystems which support livestock assets.

Governments have been slow in recognizing the role of pastoralism in development and integrating their issues into decision-making processes. In marginal lands where they dominate, basic amenities are lacking, making it difficult to maintain stability and ensure peace. Insecurity and recurring ethnic conflicts over scarce natural resources remain frequent occurrences and is a factor contributing to slowing down livestock development in the pastoral areas.

### **2.3.5 Inaccessible and high energy costs for processing**

Access to affordable energy will be pivotal to transformation of agriculture and livestock into productive and competitive sectors and to poverty alleviation in rural areas. The EAC region is facing challenge of a growing energy demand surpassing the supply. Estimates are that less than 15% of the households are connected to the national grid with the grid penetration growing slower relative to the human population growth rate. Energy consumption remains heavily sourced from traditionally biomass-based fuels, mainly wood fuel accounting for 68% of the total consumption. The energy costs in the region are less competitive to EAC competitors.

Without access to affordable energy, livestock production and trade suffers huge postharvest losses. FAO estimate postharvest losses to reach 27.2% in milk and 29.7% in meat. These losses occur during harvest, drying, storage, transportation, processing and retail and at the consumer level. The loss is attributable to limited value addition and insufficient cooling and unhygienic handling as majority of the livestock producers and traders are unable to access affordable energy.

The governments have to increase investments in alternative energy sources including geothermal power, coal, renewable energy sources, and connecting to energy-surplus neighboring countries.

#### **2.4 Investment Opportunities in the EAC Livestock Subsector**

The projected changes in consumption demands for animal source foods and the growth rate in the EAC Partner States' economies are good indicators of business opportunities in the livestock subsector. Milk, meat, hides & skins and poultry products present the most promising and attractive market opportunities for investment with projected consumption growth rate of 2 to 3% annually to 2050.

The investment opportunities in milk, meat and poultry span the whole value chain. The opportunities in the milk value chain include small and medium sized processing plants for feeds, milk products and equipments and in technical services support in farm planning, breeding technologies, milk hygiene and transport and herd recording. Large dairy processing plants is viable in high value dairy products for export in the regional and African markets.

Meat value chain is inclusive of cattle, sheep and goats. This value chain present attractive investment opportunities in fattening enterprise, ranching integrating eco-tourism and conservancy, abattoir and processing facilities, butcher equipments and reproductive technologies. The opportunities in the poultry value include broiler and layer farms, feed processing, housing and equipments, hatchery, slaughter and processing plants In addition, Technical services support present other opportunities for investors.

There are niche markets for organic livestock products in the cities and tourist hotels, which present lucrative business opportunities for up scaling of organic animal production. Value addition and branding are investments areas that have potential to create jobs and income opportunities and contribution to alleviation of poverty and hunger in rural areas.

### **3. DEVELOPMENT PRIORITY ISSUES**

The development objectives pursued by the EAC Partner States are found in various policy frameworks. The development objectives in the various policy frameworks reflect issues of development priority and expectations about the contribution of livestock subsector. Broadly, existing frameworks have essentially prioritized six objectives, which are equity, economic efficiency, self-sufficiency, stability and conservation, and capacity building.

#### **3.1 Equity Objective**

This as expressed in strategic frameworks focuses on creation of employment, wealth and income from livestock enterprises. Gender issues gain prominence under equity objective especially empowering women and improving nutrition for the children. The expected outcomes of the equity objective are distribution of wealth within the larger society, reduced poverty and hunger and improved household nutrition.

Mixed farming together with pastoral and agro-pastoral systems remain the most important for reducing food insecurity, poverty reduction and environmental degradation. However, the contribution of pastoral, agro-pastoral and mixed production systems to sustainable livelihoods of the people of EAC Partner States has remained below desirable levels of food and income security.

Though livestock stands out as a livelihood asset in smallholder and pastoral households with a large proportional contribution to household's income, gender disparity is a development concern. In terms of household income, livestock accounts for up to 68% and 75% for male and female-headed households respectively, in Tanzania and up to 52.7% and 68% for male-headed and female-headed households respectively, in Kenya. Female-headed households derive more livelihoods from livestock than male-headed households, but they face unique constraints. They have too little access to livestock services, credit, technologies, trainings, information and markets. They poorly participate in decision-making processes and farmers' cooperatives. They have a limited control over household income from livestock.

For most women, access to livestock is by virtue of their relationships to men - husbands, fathers and sons. Women prominently lack ownership and control over the land and animals on which their livestock keeping depends upon. Men traditionally control cash earned from livestock keeping and when livestock keeping is commercialised, the male increase dominance,

further limiting women's participation. Women and children both have low participation in leadership and decision making in livestock producer organisations. The young show serious indifference and disinterests to livestock farming, raising concern of who the future livestock producers will be given that a large majority of present producers is aged over 50 years and only about 25% of have attained above primary level education.

The utilisation of livestock resources places highest priority to attaining equity objective. This reflects recognition of the fact that past and current policy practices have not adequately harnessed the contribution of livestock to achieve the desired status in food security, poverty reduction, environmental health and economic growth.

### **3.2 Economic Efficiency Objective**

The economic efficiency objective is expressed in strategic actions geared to transforming subsistence production into modern commercial oriented production. The expected outcomes are enhanced contribution of livestock to economic growth, to national and agricultural GDP, increased productivity and value addition and greater market participation. Emphasis is directed to increasing incomes for producers and traders, production of surplus high quality animals and animal products for exports, effective utilization of innovations addressing production constraints of health, feeding and housing, genetics and reproduction and postharvest losses.

Increasing productivity is a priority because change in productivity levels has remained low and is slow and so is necessary but is insufficient to ensure food security, poverty reduction, improved nutrition, and maintaining the natural resource base for sustainable development. At the EAC level, the economic efficiency objective has on average attracted higher priority relative to objectives of attaining self-sufficiency, equity, stability and conservation, driven by the motivation for enhanced economic growth.

### **3.3 Self Sufficiency Objective**

The self-sufficiency objective for livestock development is expressed in the EAC Partner States' strategic frameworks aiming to produce high quality animals and animal products for the rising population and attaining food security and nutrition status. This has been pursued with regulated animal health services delivery because of the fear of high cost of importing foods of animal origin using limited foreign exchange reserves was the rationale for this objective.

However, producing high quality animals and animal products is a process entailing holistic interventions, which the strategies so far implemented missed on.

### **3.4 Stability Objective**

The stability objective is expressed in strategic frameworks designed to aid containing threats of political instability and to vulnerability to risks and price shocks from climate change and variability. The additional expected outcomes of this policy objective are stabilized food supply and prices, reduced dependency on external emergency food aids and increased resilience of livestock-dependent poor. In the past, attention was insufficiently directed to attaining stability objective for the livestock dependent communities. This is gradually shifting towards attaining stability objective in livestock development. The stability objective will now be extended to ensuring security and preventing ethnic conflicts over scarce natural resources in the arid and semi-arid lands. Newly implemented strategy to ensuring stability in livestock resource use is the application of livestock insurance facility.

### **3.5 Conservation Objective**

The conservation objective is expressed in the national strategic frameworks of sustainable use and management of livestock resources and their ecosystems. The expected outcome is reduced loss of biodiversity, particularly of the indigenous breeds, reduced degradation of grazing pastures and water resources, reduced conflicts over natural resources. The outcomes need include efficient and productive use of water resources, renewable energy use and low carbon growth pathways. Added to these are effective bio-security practices, benefit sharing and enhanced flow of germplasm between complementary methods of conservation. Conservation objective has arguably attracted the lowest priority of the five policy objectives, though the situation is changing with increased global attention to environment, biodiversity and nature conservancy.

### **3.6 Capacity Building Objective**

The EAC like other African economic blocks has low economic competitiveness. To address this development challenge, EAC Partner State governments have invested in building human capital and infrastructure and promoted private sector development needed to support industrial growth.

There has been marked increase in education enrollments from primary to university levels, but the challenge is educational relevance and quality that directly benefit industrial development in general and livestock sector in particular. Education and training emphasis scientific theories but are weak in practical application and building relevant competencies for tasks needed to advance livestock growth. A large majority of actors in the livestock value chain have formal education only up to primary level hence without prerequisite knowledge and skills needed to use modern technologies developed to enhance productivity of livestock resources. The quality and coverage of basic infrastructure in livestock producing areas remain poor because of past slow expansion in public financing of infrastructure, service delivery and involvement of the private sector.

## **4.0 POLICY GOALS AND SCOPE**

### **4.1 Vision of the Policy**

The vision of EAC livestock policy is a *“vibrant livestock industry contributing significantly to improved living standards of citizens, economic growth and sustainable natural resources management by 2025.”*

### **4.2 Policy Goal**

The goal of the EAC livestock policy is *“to develop a livestock subsector growing by at least 5.0% annually with a significant contribution to the agricultural GDP surpassing 50% and to reduction of poverty, hunger, unemployment and degradation of natural resources.”*

### **4.3 Targets of the Policy Goal**

EAC livestock policy has set targets relevant to propelling Partner States beyond outcomes attained with the past and current policy practices in order to foster attainment of the policy goal. The targets reflect the outcomes in the various development frameworks guiding overall development of regional agriculture. The priority targets by 2030 are:

- a) Increase in the annual growth rate in livestock production by more than 5.0 % to spur 10 percent economic growth targeted by Partner States; Increase in productivity and value of the multiple functions of livestock to more than 60%;
- b) Reduce degradation of the ecosystems supporting livestock assets by over 50%;
- c) Increase in the contribution of livestock to the GDP of the Partner States to reach over 55% of the Agricultural GDP;
- d) Reduction of the proportion of livestock dependent people living below the absolute poverty line and food insecure from 60 percent to less than 25%, to achieve the first MDG;
- e) Increase in public investment in livestock subsector to at least 3% of the total annual budget;
- f) Divestiture in all state corporations dealing with production, processing and marketing of livestock and livestock products that can be better done by the private sector ;
- g) Reform and streamline supportive services and regulatory frameworks; and
- h) Secured conservation of local animal genetic resources.

#### **4.4 Implementation Scope of the Policy**

The application and implementation of EAC livestock policy shall be guided by the scope of;

- a) EAC Treaty Articles that mandate Partner States' collective actions on: Livestock resource development detailed in Article 105 part 1 and part 2; and Environment and Natural resources detailed in Article 114;
- b) Common Market Protocol including the broader agriculture sector detailed in Article 45;
- c) EAC Industrialization Policy and Strategy EAC Social Development Policy Framework(2013);
- d) EAC Strategic Plan on Gender, Youth Children , Persons with Disabilities, Social Protection and Community Development

#### **5.0 POLICY OBJECTIVES AND INSTRUMENTS**

The goal of EAC livestock policy is attaining an annual growth rate of at least 5.0% with significant livestock contribution to the agricultural GDP surpassing 50% and to reduction of poverty, hunger, unemployment and degradation of natural resources. Attainment of this goal is anchored on four policy objective pillars, namely:

- a) Securing access to basic production inputs and security to stimulate productive use of livestock assets;
- b) Building resilience to risks and shocks to secure livestock assets;
- c) Enhancing growth in livestock productivity and competitiveness for livelihood benefits; and
- d) Sustaining growth in livestock productivity and competitiveness adaptable to dynamics in the livestock value chains.

This section outlines within these four objective pillars the policy issues and instruments relevant for transforming the EAC livestock subsector into a vibrant livestock industry contributing significantly to improved living standards of citizens, economic growth and sustainable natural resources management.

#### **5.1 Policy Issues in Securing Access to Basic Production Inputs and Security**

Pastoral livestock production systems in the arid and semi-arid lands (ASALs) produce most of the livestock traded in the EAC region. Pastoralists together with other livestock-dependent communities experience low rate of land utilization and pervasive tenure insecurity. Improved

land tenure systems have been slow to implement and are restricting investments in productive livestock utilization. The existing water sector frameworks do not sufficiently support efficient use of water resources in livestock production. Feed supply in all livestock production systems is characterised by seasonal fluctuations in quality, quantity, distribution price and other trade malpractices.

In key livestock producing regions, both producers and traders suffer insecurity and recurring ethnic conflicts over scarce natural resources. This is one factor contributing to slowing down livestock development in the pastoral areas. Therefore securing access to basic production resources has to be supported with social stability and ethnic cohesion supportive to productive livestock investments. The priority policy issues are therefore to ensure secured access to land, water and feed resources with strengthened security situation to foster efficient and equitable growth in the livestock subsector in order to adequately benefit the livestock-dependent communities.

#### **5.1.1 Policy instruments and strategies to enhance management of land resources**

- a) The Partner States to encourage productive livestock investments in their respective countries as per their prevailing land tenure policies;
- b) Partner States and relevant stakeholders will support and strengthen land planning services to enhance optimum land use; and
- c) Partner States Promote appropriate land management measures.

#### **5.1.2 Policy instruments and strategies to enhance secure access to water resources**

- a) Raise public awareness about water scarcity and smart water use in livestock production, processing and feed production;
- b) Promote rainwater, surface run-off harvesting and borehole sinking to ensure water is available for irrigation and livestock use, more so in the ASALs;
- c) Implement a cross-sectoral approach and promote the involvement of farmers' groups and other users to improve water governance; and
- d) Encourage investment in institutions and infrastructure that improve access to water in environmentally sensitive ways.

#### **5.1.3 Policy instruments and strategies to enhance secure access to feed resources**

- a) Invest in development and promotion of dual-purpose food-feed crops and fodder;

- b) Facilitate investment in commercial fodder production and processing and trade;
- c) Encourage formation of farmers and manufacturers associations to ease extension and service delivery for economies of scale in the feed market;
- d) Facilitate encourage, mobilise and support sustainable development of animal feeds industry;
- e) Facilitate scaling up of innovation frameworks in finding solutions to feed and fodder scarcity in livestock production systems;
- f) Strengthen research in animal nutrition, feed processing and quality improvement of crop residues;
- g) Facilitate harmonized feed standards in the EAC Partner States;
- h) Facilitate availability and accessibility of credit to SMEs/SMMEs feed manufacturers, input suppliers and investment in feed storage facilities;
- i) Facilitate harmonization of legal frameworks to control and regulate animal feeds production, marketing and importation; and
- j) Facilitate effective national strategic feed strategies.

#### **5.1.4 Policy instruments and strategies to enhance productive utilization of pastoral livestock assets**

- a) Work with stakeholders to promote effective and appropriate rules and regulations and pricing regimes to control access and use of circumscribed grazing areas, wetlands and wildlife habitats by farmers to ensure that production practices are environmentally sustainable;
- b) Work with stakeholders to facilitate co-management of common pastures based on common rules and regulations on use of common pastures in each partner state
- c) Increase investment in control and eradication of tsetse flies, control of other vector-borne diseases and TADs through research and extension; and

#### **5.1.5 Policy instruments and strategies to enhance security situation for livestock assets**

- a) Support increased investments in security and coordinated cross border security in all Partner States;

- b) Support increased investments in improved infrastructure development and markets along identified security hotspot borders in all Partner States;
- c) Support implementation of animal identification and traceability systems in all Partner States, starting with identified security hotspot borders;
- d) Support harmonized and coordinated approach to conflict resolution and natural resource management strategies

## **5.2. Policy Issues in Building Resilience in Livestock Systems to Risks and Shocks**

In all the Partner States, both livestock producers and traders experience high vulnerability to climate change induced risks and shocks including droughts, floods, and food price volatility. The risks and shock impacts on the livelihood benefits of from livestock assets. The most severe impact is felt in pastoral and agro-pastoral livestock systems which experience repeated drought related crises. This has been attributed to insufficient attention to the underlying causes of vulnerability to drought.

The priority policy issues are those that ensure mechanisms that build adaptive capacity to climate change related risks of drought and food price volatility. The policy interventions have to foster efficient and equitable growth in the subsector to sufficiently benefit the livestock-dependent poor.

### **5.2.1 Policy instruments and strategies to reduce vulnerability in livestock systems**

- a) Support development and harmonization of guidelines of livestock-based emergency plans;
- b) Support mainstreaming of the trans-boundary animal diseases control into national and regional preparedness strategies;
- c) Enhance sustainable management of ecosystems and restoration of the degraded grazing range lands;
- d) Work with relevant authorities to remove non- tariff barriers and promote regional livestock trade;
- e) Institutionalize early warning systems, disaster and risk management and responses;
- f) Empower pastoralist communities to engage in diversified economic activities;
- g) Promote alternative livelihood assets for livestock dependent communities; and

### **5.2.2 Policy instruments and strategies to build adaptive capacities to climate change**

- a) Facilitate up-scaling and out-scaling of livestock insurance schemes by the public sector on a cost-recovery basis and by private sector at market prices;
- b) Invest in human and physical capacity enhancement for designing and managing effective and efficient early warning systems;
- c) Strengthen strategic partnerships and institutional capacities for successful implementation of the EAC climate change policy adopted in May 2010;
- d) Promote adoption of affirmative development actions to hasten development in marginal livestock production systems;
- e) Support institutionalization of drought management with institutions that will ensure rapid response to climate change related risks and shocks;
- f) Encourage adoption of risk management approach which is anticipatory and preventive;
- g) Support capacity building programmes that enhance awareness and capabilities at all levels on preparedness for drought, floods and disease outbreaks;
- h) Work with stakeholders to design and implement sustainable programmes for emergency livestock feeding, sustainable management of grazing reserves and sustainable harvesting in pastoral and agro pastoral livestock systems.

### **5.2.3 Policy instruments and strategies to provide mechanisms for coping with food price volatility**

- a) Work with Partner States and stakeholders to build capacities emergency food reserves;
- b) Develop and strengthen effective information systems on local food production and markets;
- c) Increase investments in market and distribution infrastructure livestock production and trade corridors;
- d) Develop safety nets to protect the most vulnerable populations, as well as consumers and producers;
- e) Involve the Livestock keepers' organizations in the G20 Action Plan on Food Price Volatility;
- f) Support and monitor implementation and mainstreaming CAADP investment plans in livestock subsector development;

- g) Support capacity building and institutional support for Livestock keeper's organizations;
- h) Support actions that improve food governance at the national, regional and international levels;

### **5.3 Policy Issues in Enhancing Growth in Livestock Productivity and Competitiveness**

Low productivity of livestock assets prevails in production systems that livestock-dependent poor operate. Increases attained in livestock production have been due to increased population and not productivity. This has increased pressure on natural resource base and ecosystem services yet the policies and programmes on livestock-environment interaction are weak or weakly enforced.

Veterinary services in the EA Partner States previously provided by the State have been gradually privatised with decrease in funding. As a consequence, services and state regulatory functions have declined in quality. Public extension systems in the region are generally weak and ineffective which is attributable to relevance and responsiveness of the processes of generation and dissemination of technologies and innovation to needs and demands of livestock-dependent people and entrepreneurs.

In production systems that utilise animal breeds of high genetic potential, disease incidences and feed scarcity and quality present challenges to realising increased productivity. There are however, opportunities in the use of novel biotechnology techniques for many of the production constraints in health, nutrition, genetics and reproduction.

Productivity enhancing technologies exist but their uptake is low because of low capacity of the producers and traders. Partly contributing factors is ineffective delivery of inputs and outputs services not fitting to the needs of smallholder producers and traders dominating the livestock subsector. Services requiring improved and targeted delivery are health services, extension services, financial and market services.

There are challenges in availability of quality data and information for planning interventions in the livestock subsector. Existing production, processing and marketing and consumption data and information are often estimates from unstructured observations and the local knowledge of extension workers. Extension services apply limited scientific approach to data collection, processing and in survey sampling techniques. All the Partner States have low frequency of

livestock censuses and surveys, raising general concerns over data reliability. Consequently the data available is often less informative for planning interventions and policy decisions.

### **5.3.1 Policy instruments and strategies to strengthen delivery and governance of veterinary health services**

- a) Support promotion of animal health services that offer comparative advantage and benefits to marginalised livestock producers and traders;
- b) Promote private contracting of accredited or licensed veterinary and livestock inspectors to perform inspections, audit and certification functions to benefit livestock subsector growth and competitiveness;
- c) Support Partner States to implement cost-recovery strategies in public animal health services to improve quality and coverage of services and impact on livelihoods;
- d) Support Partner States to establish a joint system of human-animal health service delivery where the approach support livelihoods benefits, saves on transaction costs, and where there are limited infrastructures and facilities for disease surveillance, diagnosis and control;
- e) Work with Partner States and key stakeholder on mechanisms to facilitate the growth of livestock-focused Membership-based organisations to widely spread access to animal health services and veterinary supplies;
- f) Promote programs that empower poor livestock producers and traders to demand quality animal health services;
- g) Support mainstreaming of one health approach in control and prevention of TADs, Zoonoses and Emerging Infectious Diseases;
- h) Build human resource capacity and institutions at all levels to support research, technology development and dissemination of animal health innovations;
- i) Facilitate harmonisation of the livestock regulatory frameworks and disease control services among the Partner States;
- j) Support increased investment in animal health services that directly benefit the public; and
- k) Mobilise resources for establishment of regional advanced disease surveillance and diagnostic facility.

### **5.3.2 Policy instruments and strategies to enhance access to quality extension services**

- a) Support increased investments in strengthening educational relevance and quality in technical, vocational and tertiary education and training in livestock production;
- b) Promote mainstreaming of value chains and innovation system approaches in extension services;
- c) Promote use of technologies to enhance cost-effectiveness, timeliness in reporting and user friendliness;
- d) Promote private engagement in livestock extension services; and
- e) Promote peer fora discussion groups to hasten lesson learning between farmers and traders.

### **5.3.3 Policy instruments and strategies to promote information sharing**

- a) Facilitate regional surveillance, collection and use of knowledge and information at the regional, national and local community levels;
- b) Promote and support development and management of domestic, regional and international livestock products market and trade information databases to inform intervention initiatives;
- c) Promote use of technologies to enhance cost-effectiveness, timeliness in reporting and user friendliness;
- d) Encourage mainstreaming of national livestock census into population census across the Partner states; and
- e) Build human and physical capacities to periodically produce EAC livestock policy briefs to inform on investment opportunities, innovation and developments in the livestock subsector.

### **5.3.4 Policy instruments and strategies to enhance access to quality breeding stock**

- a) Support public investment in infrastructure for animal breed improvement and multiplication of high quality breeding stock;
- b) Promote sustainable utilisation and conservation of indigenous breeds with unique attributes;
- c) Facilitate regional trade and investment in animal semen, embryos and biotechnology research for production of quality breeding stock;
- d) Support public-private partnerships in livestock improvement and multiplication of quality breeding stock;
- e) Advice on and support sustainable livestock breeding programmes in Partner States;

- f) Support Partner States to establish animal conservation and breeding centres; and
- g) Domesticate and implement the Global Plan of Action on Farm Animal Genetic Resources conservation and utilisation.

### **5.3.5 Policy instruments and strategies to enhance wider application and benefits of biotechnology**

- a) Increase investment in establishment of regional advanced biotechnology research facilities and centers of excellence;
- b) Prioritise biotechnology research in diagnostics product development and vaccines for diseases of economic importance; and
- c) Prioritise biotechnology research in genetic and product improvement technologies, animal feeds and nutrition.

### **5.3.6 Policy instruments and strategies to enhance secure access to financial services and products**

- a) Promote implementation of fiscal and monetary policies that mainstream the principle of “inclusive growth” to achieve inclusive growth in livestock subsector;
- b) Support Partner States to facilitate financing of livestock based on-farm and non-farm investments through awareness creation, capacity building and incentives;
- c) Advocate for implementation of fiscal and monetary policies that include livestock recording, registration and transactions as collateral for securing loans;
- d) Advocate for implementation of fiscal and monetary policies that facilitate application of warehouse receipt systems in livestock enterprises as collateral for loans;
- e) Support institutionalized provision of incentives for financial institutions to trade in mobile banking services and products accessible to livestock producers, traders and SMEs;
- f) Promote appropriate institutional frameworks to support development of financial services and products accessible to livestock producers, traders and SMEs;
- g) Work with relevant stakeholders and development partners to facilitate access to credit databases from credit bureaus on financial transactions by borrowings for livestock enterprise; and.
- h) Promote strengthening and capacity building of cooperatives, village banks and Self Help Groups to provide financial services and products to livestock producers, traders and small SMEs.

#### **5.4 Policy Issues in Sustaining Growth in Livestock Productivity and Competitiveness**

While there are concerted efforts from all fronts to enhance growth in productivity and competitiveness in the EAC livestock subsector, external forces are threatening sustainability of the gains already made. Present livestock production practices are unable to meet high standards of safety and quality products for lucrative niche markets, both domestic and export. Pastoral and smallholder livestock systems where the bulk of livestock and livestock products are produced experience capacity challenges in adapting and responding to changing consumer demands and market conditions. Both public and private investments remain insufficient in research on emerging issues of food and feed safety and quality.

Aflatoxin contamination affects both feed and animal products, thus increasing postharvest losses. Aflatoxin contamination of feed and food has been linked to cancer, immune-system suppression, growth retardation, liver disease, and death in both humans and domestic animals. Consequently, it reduces feed and food quality and trade opportunities in both local and export markets.

Participation of the EAC Partner States in livestock export market is very limited because of strict sanitary requirement for more lucrative markets, low levels of production and quality, and the poor condition of the infrastructure that increases marketing costs. Imports surpass exports while trade between the EAC Partner States has great potential opportunity for poor livestock keepers who currently engage in informal trade because of market barriers. Energy supply and costs currently discourage most livestock producers and traders in engaging in value addition to reduce postharvest losses, enhance hygiene practices and process high value products.

Formulation and implementation of programmes that boost market functioning and access to affordable energy can benefit livestock producers and traders and improve their livelihoods from use of livestock assets.

Livestock production potentially generates both negative and positive externalities on the environment, but mainstreaming of environmental protection into livestock value chain development has been slow. From animal wastes are nitrogen and phosphorous nutrient pollution of land and water, and noxious emissions of methane and nitrous oxide. Overgrazing

and soil compaction is a problem in pastoral and agro-pastoral systems. Fertilizer and pesticides used for feed crops pollute soils. Deforestation contributes to CO<sub>2</sub> emissions and reduced biodiversity results from pressure to clear land for pastures or to grow animal feeds.

However, policies and programmes on livestock-environment interaction are weak or enforced weakly, thus unable to ensure adoption of sustainable livestock production practices to minimise the negative externalities of livestock sector growth on the environment. The situation is worsened by non-existent or malfunctioning markets and trade, which discourage private investments in sustainable productivity and competitiveness.

Gender issues are in the development agenda for interventions to improve livestock productivity. Both women and the youth often miss out in interventions because of little access to services, credit, technologies, trainings, information and markets. They have a limited control over household income from livestock. They poorly participate in decision-making processes and farmers' cooperatives.

The young show serious indifference and disinterests to livestock farming, raising concern of who the future livestock producers will be given that a large majority of present producers are aged over 50 years with only about 25% having attained formal education above primary level. Efforts to building critical mass of skilled manpower is facing challenges of high levels of HIV/AIDs infection while reducing productivity of those already supplying the agricultural labour force.

#### **5.4.1 Policy instruments and strategies to promote gender equity, youth participation and HIV and Aids awareness**

- a) Support promotional campaigns on the understanding and integrating of gender issues into livestock projects and programmes;
- b) Facilitate expansion of opportunities for business and employment in the livestock enterprises for women and the youth who often suffer unemployment and income generation opportunities;
- c) Support Partner States to run promotional campaigns and SME livestock enterprises to change attitudes towards business in livestock production and trade;
- d) Facilitate entrepreneurial knowledge and business linkages by operators and supports in livestock value chains of each Partner State;and

- e) Encourage Partner States to establish, revitalise and strengthen vocational training facilities for competitive livestock production and trade.

#### **5.4.2 Policy instruments and strategies to promote livestock market functioning and trade**

- a) Promote opportunities that expand local production and processing of livestock commodities where there are comparative economic and environmental advantages;
- a) Promote livestock markets infrastructure development in rural areas;
- b) Encourage public frameworks supportive to formation of market-oriented livestock producers and traders organizations;
- c) Facilitate programs that build capacities of livestock traders associations and cooperatives to participate in collection and dissemination of livestock market information;
- d) Facilitate actions in Partner States for designing and implementing contract farming schemes for multiplication of breeding stock;
- e) Build partnerships for integrated livestock market information collection, analysis and dissemination and livestock commodity exchanges at the national and regional levels;
- f) Mainstream the in the extension service the concept of making markets work for the poor (M4P).
- g) Promote frameworks and incentives for livestock exports from the region;
- h) Support capacity building in the design and implementation of import and export restriction measures that benefit local livestock producers and traders;
- i) Support institutional, infrastructure and human capacity building for application of Animal health and food safety standards and regulation;.
- j) Support Partner States to forge public-private partnerships to build capacity for viable animal disease-free zones;
- k) Invests in trade-enhancing infrastructure for livestock and livestock products prioritising facilities for quarantine, export quality slaughterhouses and tanneries; and
- l) Build local capacity for participation in the International Standard Setting Organisations (ISSOs).

#### **5.4.3 Policy instruments and strategies to enhance food and feed quality and safety**

- a) Play facilitative and coordinative roles in harmonisation of food and feed safety standards;

- b) Support capacity building in food and feed safety standard;.
- c) Facilitate and coordinate effective dialogue on the application of food and feed standards;
- d) Facilitate upgrading of effective national food safety control capacity, infrastructure and financing facility;
- e) Support capacity building in animal welfare practices and organic animal production practices;
- f) Promote private contracting of accredited or licensed veterinary and livestock inspectors to perform inspections, audit and certification functions to benefit livestock subsector growth and competitiveness;
- g) Invest in research in food and feeds production and quality of the product;and
- h) Work with Partnerships Aflatoxin Control in Africa (PACA) and invest in integrated and coordinated mitigation and management of Aflatoxin in the livestock value chains.

#### **5.4.4. Policy instruments and strategies to strengthen research in livestock subsector**

- a) Advocate for Partner States commitment to allocating at least 5% of the annual research budget to livestock research;
- b) Mobilise resources for establishment and administration of competitive livestock research funds;
- c) Invest in capacity building, laws and programmes strengthening intellectual property rights;
- d) Prioritise research support to animal-based mechanisation and integrated nutrient management research;
- e) Prioritise research support to development of sustainable intensive commercial livestock production enterprises in the peri-urban areas;
- f) Support programmes targeting zonal research mandates for both applied and on-farm research along centralised basic research;
- g) Support collaborative public-private research agendas in priority concerns to livestock value chain actors; and
- h) Support institutionalisation of Levy-funded research at country and regional levels on fast growing livestock commodities.

#### **5.4.5 Policy instruments and strategies to enhance conservation and sustainable utilisation of livestock resources**

- a) Strengthen institutional capacities and engagements for strategic partnerships in implementation of the global plan of action for animal genetic resources;
- b) Promote sustainable utilisation of indigenous breeds with high priority to rare breeds with unique attributes through branding, incentives and protection frameworks;
- c) Support investments in regional conservation facilities; and
- d) Strengthen institutional capacities and engagement with strategic partners for effective and successful implementation of the global plan of action for animal genetic resources.

#### **5.4.6 Policy instruments and strategies to enhance contribution of livestock to ecosystem productivity**

- a) Support actions for implementation of livestock zoning and discharge quota system where potential is high for negative environmental externalities;
- b) Support and promote implementation of payment for environmental services (PES) schemes in livestock systems;
- c) Support actions for enhancing marketing of livestock-related environmental goods and services from carbon trade, biogas and ecotourism;
- d) Support application of polluter pays principle in intensive livestock production systems in fragile ecosystems to contain the negative environmental impacts of livestock production systems;
- e) Support actions for implementation of rules and regulations and pricing regimes to control access and use of fragile ecosystems; and
- f) Support participatory processes and actions for implementation of community management of common pastures and water and other fragile ecosystems in each Partner state.

#### **5.4.7 Policy instruments and strategies to enhance access to affordable energy**

- a) Support increased investments in supplying accessible and affordable energy to livestock producers and traders;
- b) Support increased investments in technologies that harnessed energy from organic material (biogas and biodiesel), micro-hydro systems, solar and wind;
- c) Support promotion of commercialisation of local energy innovation to upscale and access to affordable energy sources; and
- d) Support promotion of private sector investment in local energy solutions.



## **6.0 INSTITUTIONAL AND GOVERNANCE FRAMEWORK**

### **6.1 Institutional Arrangements, Coordination and Implementation**

The EAC Livestock Policy will be implemented by the individual Partner States with the participation of both public and private sector actors and the civil society. The EAC Secretariat will guide the implementation of the policy in consultation with relevant EAC organs of decision making facilitated by the ministries responsible for EAC affairs and the Sectoral Council on Agriculture and Food Security.

EAC Secretariat will establish an institutional framework and sufficient capacity that will coordinate the sector programmes which have clear linkages to Partner States. The EAC secretariat will strengthen its capacity to be fully responsible for coordinated implementation of the EAC livestock policy in strategic partnership at the national, regional and global levels.

EAC secretariat and Partner States' responsible ministries of livestock development will work with strategic partners on each strategic decision and actions of the policy. The relevant actions include technology generation, knowledge management, capacity building, policy development and emergency responses. The strategic partners will play a role fast tracking the specific actions towards the development outcomes of the policy.

The EAC Secretariat work with Partner States to prepare a national master plan of action and implementation strategy of rolling out the EAC livestock policy in their national livestock programmes. The national master plans will detail implementation timeframe, specific actions, investments, responsible actors and the indicators of progress for Monitoring and Evaluation towards achievement of the policy objectives and targets. The national master plan allows for prioritisation of actions by each Partner State to reflect unique capacities and circumstances.

A regional Animal Resources Committee (ARC) will be formed to advise the EAC Agriculture and Food Security Council of ministers on technical matters of animal resources development. The EAC secretariat will propose the nature and composition of ARC Technical Committees. The technical committees will work with national and regional technical networks for advisory purposes on specific technical issues.

## **6.2 Role of Stakeholders**

### **6.2.1 Public sector**

The Partner States governments will be responsible for policy reform process and maintaining an enabling macro-economic policy environment conducive for private sector participation in economic development and growth. The national governments will also provide support services needed for realisation of the four policy objective pillars of secure access to inputs and security, building resilience to risks and shocks, enhancing livestock productivity and competitiveness, and sustaining livestock productivity and competitiveness.

Public support will be directed to provision of core public services in infrastructure development, strengthening institutions and regulatory services, capacity building, research and security and negotiating trade opportunities. A strong partnership with NGOs/CBOs in fostering rural development will be encouraged in the EAC.

### **6.2.2 Private sector**

The private sector comprises of various entrepreneurs, traders, livestock keepers and organisations which are motivated by profit to undertake investment in provision of services to actors in the livestock value chains. The private sector will be play significant roles in advancing livestock value chains development. The private sector will be encouraged to take up provision of some of the public services such as extension, research and training and provide opportunities for employment.

### **6.2.3 Livestock stakeholder Organisations**

These are grass-root organizations, which are important for development and change in the livestock value chains. The involvement of communities and their organisations is essential to ensuring success in the implementation of the policy. Governance and participation of the livestock based organisations will be strengthened to support better service delivery, uptake and up scaling of innovation, and participatory policy formulation in the livestock value chains.

### **6.2.4 Non-Governmental Organization and Community Based Organisations**

Partner States' governments will provide an enabling environment for NGOs/CBOs interventions. A strong partnership with NGOs/CBOs in fostering rural development will be

encouraged in the EAC. These are essential partners in fostering development as they play an important role in the provision of knowledge and mobilisation of resources at the grass-root level.

### **6.2.5 Professional Associations and Societies**

These are associations or societies of professionals in the livestock sector. They include but not limited to veterinary associations, animal productions association/ societies, breeders' association, livestock technician associations amongst others. The associations will play a cardinal role in empowering stakeholders, undertaking professional assignments and play a role in advocacy. They will be engaged in collection of livestock data and information to inform the decision making by the authorities.

### **6.3 Financial Arrangements**

The financing of primary production through loans is at extremely low levels and one of the key constraints to livestock development in the EAC. However, rural saving and credit societies are gaining importance and to some extent funds through these channels are invested in the agricultural and rural sectors e.g. through group lending schemes. In addition, local NGOs, CBOs and Civil Societies will play a big role in financing since many of them have strong relationship with the livestock keepers in the rural communities including the arid and semi arid areas of EAC.

Financial institutions including commercial banks, cooperatives, development micro finance institutions, insurance organisations will be encouraged to provide investment and operating capital to livestock entrepreneurs. Partner States will foster the flourishing of formal and informal micro finance institutions with targeted policies to remove barriers and bottlenecks. Support and strong collaboration from international development partners will be sought for the implementation of this policy.

The EAC Secretariat shall initiate the establishment of a Common Agricultural and Rural Development Fund (CARDF) from where various joint programs will be funded. However, respective Partner States will be responsible for funding their local components.

#### **6.4 Information and Communication Strategy**

Provision of reliable information and effective communication is of essence to successful implementation of the policy and its intended outcomes. This includes collection, collation and analysis of livestock resource and market data and dissemination of information to both Partner States and to strategic partners for decision making. EAC will build capacity in policy analysis, policy brief preparation and invest in information and communication technologies to effectively manage the knowledge products generated. The EAC Secretariat will strengthen working relations and information sharing with other RECs – ASARECA and other bodies including the AU-IBAR, ILRI, FAO, and OIE to gain on synergies and avoid duplications.

#### **6.5 Policy Monitoring and Evaluation**

Towards the set targets relevant to propelling Partner States beyond outcomes attained with the past and current policy practices, EAC Secretariat in collaboration with Partner States will develop and apply an integrated Monitoring and Evaluation System to measure progress in strategic decisions and actions of this policy and its effectiveness. Together with Partner States, EAC will develop relevant performance indicators of changes in livelihood benefits, income, production quantity and value, production costs, productivity, marketed production and value, quantity of processed products and value, and adoption of technology and innovations. The M&E tools, data and information collection and sharing mechanisms will be developed linked to strategic decisions and actions and baseline data to track outcomes of the policy implementation. The system will be established in a graduated manner, based on pilots, testing and demonstrating success. It will promote creation of an enabling forum for sector-wide consultation at national and regional levels to increase participation of all strategic partners.

## GLOSSARY

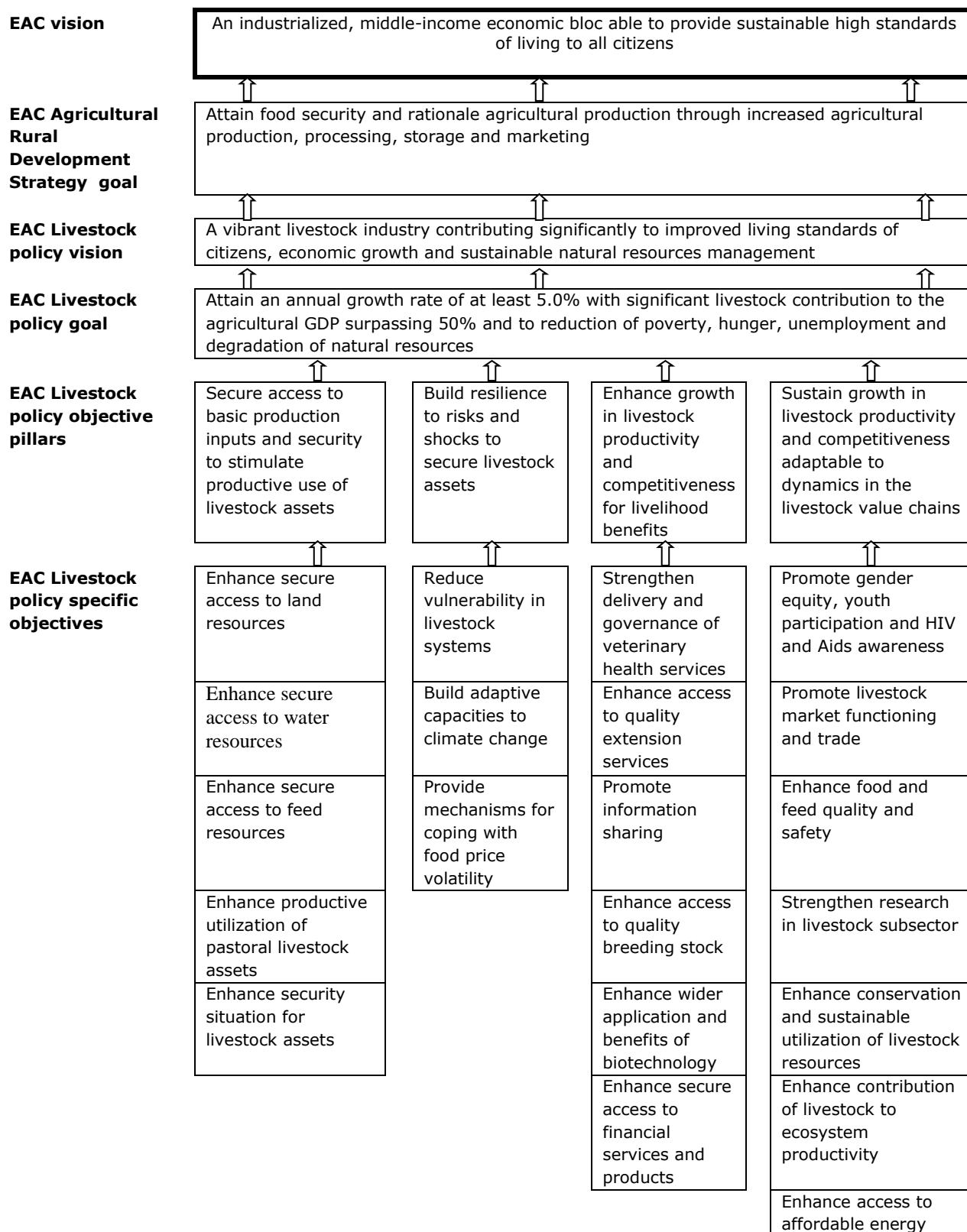
These definitions are provided for the purpose of this EAC Livestock Policy document only. The definitions are designed to minimize misinterpretation and enhance clarity in the meaning of different terms used in the document.

<b>Agro-pastoralism</b>	A production system in which livestock owners practice both livestock and crop farming in marginal lands for sustenance livelihoods.
<b>Biodiversity</b>	The variety and variability of animals, plants and micro-organisms used directly or indirectly for food and Livestock production including crops, livestock, forestry and fisheries. It also includes the diversity of non-harvested species that support production (e.g. soil micro-organisms, predators, pollinators and so on) and those in the wider environment they support agro-ecosystems (livestock, pastoral, forest and aquatic), as well as the diversity of the agro-ecosystems.
<b>Bio-security</b>	Protection of the health of livestock and human beings from disease.
<b>Biotechnology</b>	The use of biological system to produce a product, the use of biological system as a product <b>OR</b> the use of the techniques of biotechnology to indirectly provide a product, process or service.
<b>Crop residues</b>	The remains of a crop on a field after harvesting that have a feeding value to livestock.
<b>Crossbreeding</b>	Mating animals of two or more different breeds, strains or lines.
<b>Embryo transfer</b>	The technique of removing an embryo from one female (donor) and inserting it into the reproductive tract of another female (recipient).
<b>Exotic Breed</b>	Livestock species that originate from foreign countries being introduced in the country.
<b>Extension Service</b>	Defined as the transfer of technology from experts to livestock farmers. The word "experts" include farmers who are capable of supplying such services to others.

<b>Gene</b>	The basic unit of inheritance. Genes determine how an organism (animal or plant) appears, develops and performs.
<b>Gene Bank</b>	A physical repository, in one or more locations, where the samples of animal or plant genetic resource populations which are being preserved or kept. These may include animals, plant, embryos, oocytes, sperms, ova and DNA material.
<b>Genetic Improvement</b>	The application of biological, economic and mathematical principles The object of discovering optimum strategies to exploit the genetic variation existing within an animal species, particularly in order to maximize its merit."
<b>Government</b>	Partner State of the EAC.
<b>Livestock</b>	Domestic farm animals raised for food, income and other livelihood benefits
<b>Livestock assets</b>	The natural, financial, physical, social and human capitals derived from livestock keeping and trading.
<b>Livestock producer</b>	Any person who engages in livestock farming for the production purposes.
<b>Livestock Industry</b>	Activities involving all aspects of livestock development.
<b>Livestock Support Services</b>	Activities that support livestock industry. These include training, research, extension, animal health, farm power, credit, storage, transport, processing, input delivery system, etc.
<b>Local breed</b>	A breed that is adapted to a specific habitat and that has been shaped, often over centuries, by the cultural preferences of a particular community or ethnic group.
<b>Milk product</b>	Any product prepared from milk by any approved process including heating, separation, fermentation, evaporation, drying and includes cultured sour milk, yoghurt, butter, ghee, cream, dairy ice cream and any other product manufactured wholly or mainly from milk.
<b>Minister</b>	The person duly appointed by the State to be responsible for livestock development.
<b>Ministry</b>	National public department mandated to provide public services in specified sectors.
<b>Pastoralism</b>	A production system entailing seasonal movement of livestock herds in search of water and pasture in which the owners depend solely on livestock and livestock products for sustenance livelihoods.

<b>Policy</b>	Set of strategic decisions guiding actions selected to achieve some development goals
<b>Policy instruments</b>	Strategic actions taken to implement a policy e.g. specific tax, law or regulation.
<b>Rangeland development</b>	Pasture improvement, water development and conservation; and rangelands utilization and conservation.
<b>Rangeland</b>	An extensive area that is not cultivated, and contains forages, which can sustain animals.
<b>Stakeholder</b>	Individual, organization or institution, private or public, that in one way or another has interest in and is concerned with the carrying out of activities relating directly or indirectly to the livestock industry in the country.
<b>Strategy</b>	The path taken to achieve a particular set of objectives.
<b>Zoonosis</b>	Disease that can be transmitted from animals to humans and vice versa.

## Linking EAC Livestock Policy Objectives to EAC Development Vision



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