





# **COUNTY NUTRITION ACTION PLAN (CNAP) - 2018/19-2022/23**



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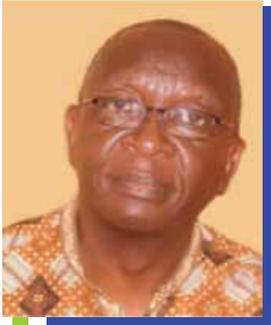
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# List of Abbreviations and Acroynms

<b>ACSM</b>	Advocacy Communication and Social Mobilization
<b>ANC</b>	Antenatal Care
<b>BFCI</b>	Baby Friendly Community Initiative
<b>BFHI</b>	Baby Friendly Hospital Initiative
<b>BOMS</b>	Board of Management
<b>CDOH</b>	County Department of Health
<b>CIDP</b>	County Integrated Plans
<b>CHSSIP</b>	County Health Sector Strategic & Implementation Plan
<b>CLTS</b>	Community Led Total Sanitation
<b>CNAP</b>	County Nutrition Action Plan
<b>CNTF</b>	County Nutrition Technical Forum
<b>DRNCDs</b>	Diet Related Non-Communicable Diseases
<b>EBF</b>	Exclusive Breastfeeding
<b>ECDE</b>	Early Childhood Development
<b>ECDE</b>	Early Childhood Development Education
<b>EMS</b>	Emergency Medical Services
<b>GDP</b>	Gross Domestic Product
<b>HINI</b>	High Impact Nutrition Interventions
<b>IEC</b>	Information Education and Communication
<b>IFAS</b>	Iron Folic Acid Supplementation
<b>KDHS</b>	Kenya Health Demographic Survey
<b>KHIS</b>	Kenya Health Information System
<b>KRAs</b>	Key Result Areas
<b>MEAL</b>	Monitoring Evaluation Accountability and Learning
<b>MIYCN</b>	Maternal Infant and Young Child Nutrition
<b>MNPs</b>	Micronutrient Powders
<b>OPD</b>	Out Patient Department
<b>PD Hearth</b>	Positive Deviance Hearth
<b>SBCC</b>	Social Behavior Change Communication
<b>SCHMT</b>	Sub County Health Management Team
<b>SETH</b>	System Enhancement Transforming Health
<b>SMART</b>	Standardized Monitoring and Assessment of Relief and Transition
<b>VAS</b>	Vitamin A Supplementation
<b>WASH</b>	Water Sanitation and Hygiene
<b>WRA</b>	Women of Reproductive Age
<b>WUA</b>	Water User Association

# FOREWORD



The Constitution of Kenya article 43 (1) gives every person the right to: the highest attainable standard of health, freedom from hunger and access to adequate food of acceptable quality. The national and county government is committed to creating an enabling environment for citizens to realize these rights as evidenced in the Vision 2030, Kenya Health Policy (2014–2030) and the National Food and Nutrition Security Policy, 2012.

Busia County Nutrition Action Plan (CNAP) 2018/19-2022 is aligned with the Kenya Nutrition Action Plan (KNAP 2018 - 2022), Busia county Health Sector Strategic & Implementation Plan (CHSSIP) 2018-2023 and County Integrated development Plan (CIDP) 2018 – 2023. The plan recognizes the role of nutrition as a fundamental human right and a driver to accelerating economic development as envisioned in vision 2030. Food and nutrition security is characteristic of people’s physical and economic access to sufficient, safe and nutritious food to meet their dietary needs and food preferences. This translates to how well the citizens (men and women across all ages and diversities) are equitably empowered and provided with an equitable and enabling environment to meaningfully participate and contribute as strong agents of change, in addressing the key long-term drivers of food and nutrition security. To achieve this there is need to understand the specific needs and vulnerabilities of women, men, girls and boys across all diversities in the county. This will help design tailor made nutrition programming while equitably building on their capacities, knowledge, and experiences and directing capacity, human and material resources as best needed.

The development of this CNAP provides practical guidance to implementation of Busia County commitments to nutrition interventions. The CNAP will provide a framework for coordinated implementation of High Impact Nutrition Interventions (HINI) and nutrition sensitive programs by County Government and nutrition stakeholders. The alignment of CNAP to CHSSIP 2018-2023 facilitates mainstreaming of nutrition budgeting process into County budget, hence, allocation of resources to nutrition programmes towards nutrition specific and sensitive interventions. The plan will be used as an advocacy tool for resource mobilization within and without the county borders. The document also emphasizes multi-sectoral coordination and collaboration approach in planning, implementation and monitoring of nutrition specific and sensitive interventions, hence fostering departure from past trends in addressing the nutrition agenda within the county.

The plan was developed through a consultative process involving all stakeholders in health and nutrition as well as other line county departments. This included the county health leadership, county government line departments, national line ministries, development partners and implementing partners. The implementation of the CNAP will cover four years beginning July 2019 to June 2022. The County department of Health (CDOH) will monitor implementation of the CNAP, conduct mid-term review to assess progress and end term evaluation to inform priorities for the subsequent CNAP planning period.

This CNAP demonstrates the County government’s commitment to its vision of making Busia a healthy, productive and internationally competitive County.

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Hon. Moses Mulomi  
Deputy Governor

Acting County Executive Committee Member for Health and sanitation

# PREFACE



Busia County Nutrition Action Plan (CNAP) 2018/19-2022/23 is a comprehensive and overarching framework for coordination, implementation and mobilization of resources for nutrition interventions in health and other key line county departments. The plan has incorporated priorities in the County Integrated Development Plan 2018 - 2023 (CIDP) and County Health Sector Strategic and Implementation Plan 2018-2023 that informs subsequent nutrition annual work plans.

CNAP 2018/19-2022/23 outlines high impact nutrition specific interventions and nutrition sensitive interventions to be undertaken at all levels in health sector and other county line departments. In line with the Constitution of Kenya, the county Integrated Development Plan 2018-2023(CIDP) and the SDGs, the CNAP has integrated other cross cutting nutrition sensitive sector based legislations, policy, plans and guidelines in support of an enabling environment for optimal food and nutrition security in the county, through addressing poverty alleviation, gender equality and empowerment of women and girls, child and maternal health, reducing HIV/AIDS and communicable diseases and environmental sustainability. This is with a major aim to achieving effective and sustainable food and nutrition security leading to improved nutrition and health related outcomes. The document will be reviewed periodically as new ideas, innovations, programs and policies are developed. We urge all partners, line departments and stakeholders to familiarize themselves with the content to achieve the overall CNAP objective. The department of health and sanitation will provide the required stewardship and oversight to ensure full implementation of this plan.

The department is committed to enhance efficiency in the utilization of existing resources and advocate with the relevant arms of the County and National Government on the need for additional resources. We encourage our stakeholders and partners to complement the department's resource mobilization efforts to fully realize the plan.

A handwritten signature in black ink, appearing to read 'ISAAC OMERI', enclosed within a hand-drawn oval shape.

**DR. ISAAC OMERI**  
**Chief Officer for Health and sanitation**  
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# ACKNOWLEDGEMENT



A handwritten signature in black ink, appearing to read 'Melsa Lutomia', positioned above a dotted line.

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Dr. Janerose Ambuchi  
County Director Health, of  
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Services

Busia County Department of Health and Sanitation acknowledges the contribution of the County government leadership, development and implementing partners and all other stakeholders who participated in the development of County Nutrition Action Plan (CNAP) 2018- 2022. This CNAP was developed with support from Nutrition International under the Technical Assistance for Nutrition (TAN) project, funded with UK aid from the UK government. Special thanks go to Nutrition International (NI) staff led by Martha Nyagaya, Joy Kiruntimi, Sarah Kihianyu, for the immense technical leadership support in the entire process of developing the CNAP 2019 to 2023. We appreciate Nutrition and Dietetics Division of Ministry of Health, Kenya Nutrition and Health Program Plus (NHP PLUS), Systems Enhancement for Transforming Health (SETH) and AMPATH PLUS for their technical and financial contribution.

The contributions of the following ministries in providing technical inputs to the CNAP are also highly appreciated: This particularly goes to Ministries of but not limited to; Education; Water and Sanitation; Gender, Youth, Culture, sports, Social and Children services, Agriculture and Live-stock. The contribution of the County Executive Committee Member (CECM) health, Chief Officer of health, the county health management team (CHMT), and Sub-County Nutrition Coordinators (SCNCs) during the development and/or validation of the CNAP is gratefully acknowledged.

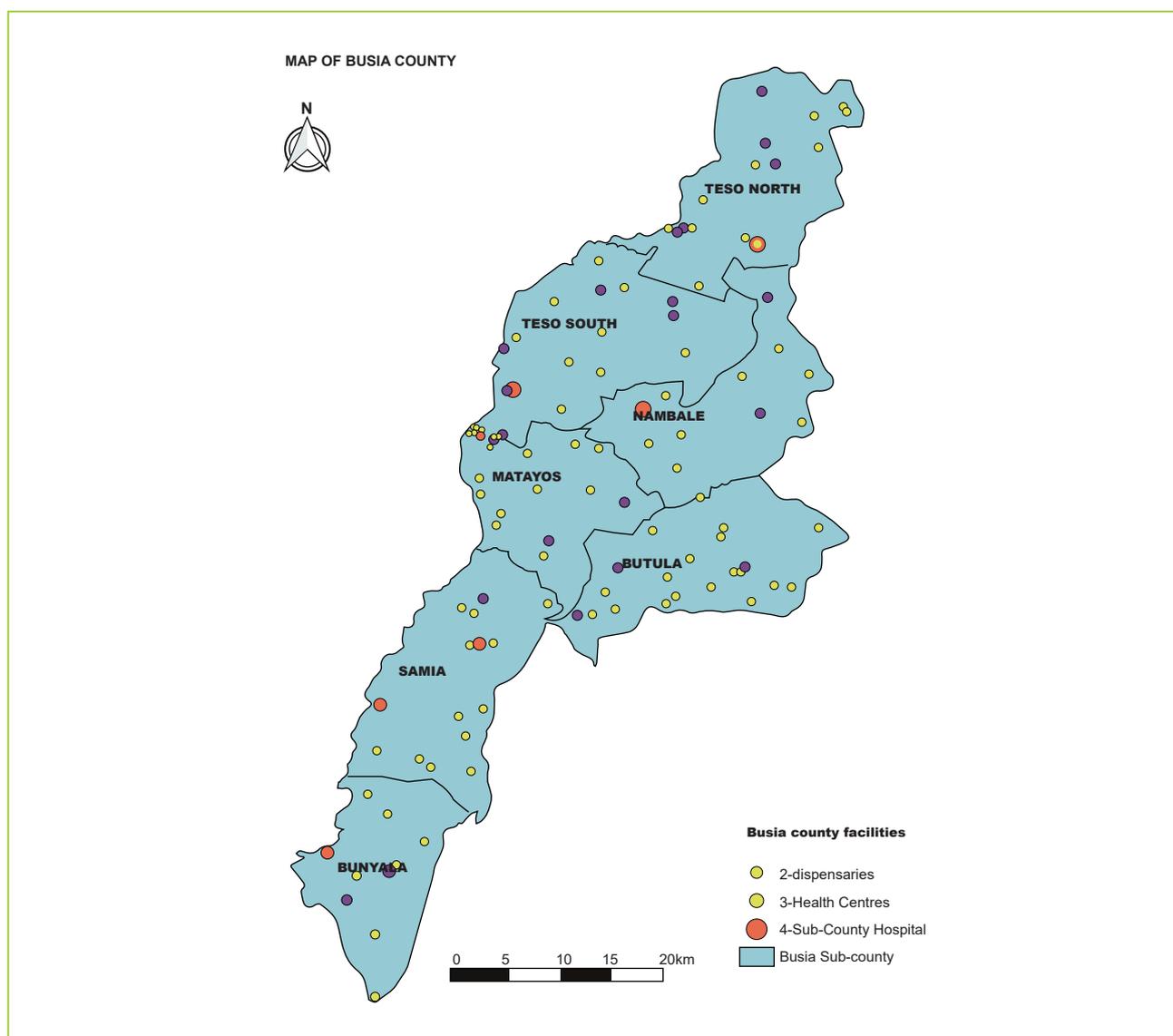
Lastly, County department of health greatly appreciates the technical support of Betty Samburu and the consulting team; Dr. Daniel Mwai, lead consultant (costing, resource mobilization legal and institutional environment), David Njuguna (policy, costing, financial tracking and resource mobilization), Dr. Wangia Elizabeth (M&E and accountability plan) and Clementina Ngina (nutrition expert) for providing the technical support throughout the whole development process.

# CHAPTER ONE

## 1.1 BACKGROUND

**BUSIA** County is situated in western Kenya and serves as the gateway to Kenya's regional neighbours; Uganda, Rwanda, Burundi, DRC Congo and Southern Sudan, with two formal border crossing points at Busia and Malaba Towns. Busia County Government has its headquarters in Busia Town and covers an area of 1,694.5 square kilometres (km<sup>2</sup>). It is situated at the extreme Western region of Kenya and borders Bungoma County to the North, Kakamega County to the East, Siaya County to the South East Lake Victoria to the South West and the Republic of Uganda to the West. It lies between latitude 0° 45 North and longitude 34° 25 east. The County can be accessed through Kisumu International Airport which is 112 Km away. The map of Busia County and its administrative units is shown below:

Figure 1.1: Map of Busia



Source: Independent Electoral Boundaries Commission (IEBC)

## 1.2 Population Demographics

Busia County is subdivided into seven sub counties namely; Matayos, Butula, Samia, Bunyala, Nambale, Teso South and Teso North. It has population of 893,681—as per the Kenya National Bureau of Statics Census report 2019. The table below shows the current population description segregated by sex and sub counties.

Table 1.1: Distribution of population by sex and sub-county

Sub county	Male	Female	Totals
Bunyala	41465	44511	85976
Busia	69034	73373	142407
Butula	65136	75195	140331
Nambale	52900	58732	111632
Samia	50821	56341	107162
Teso North	66412	71619	138031
Teso South	80484	87630	168114
Totals	426,252	467,401	893,653

Source: (KNBS , 2019)

## 1.3 Population description

The estimated number of households in Busia County is 173,996, with an average family size of 5. The poverty level stands at 66.7%, while the literacy level is 75.3%. The male to female ratio stands at 1:1.08 i.e. 48% male and 52% female. The age dependency ratio is 100:107. Almost half of the population (47.1%) is children aged 0 to 14 years, and 26.4% are women of reproductive age. The population is further distributed as follows: under one, 3.6%; under five, 17.5%; adult population, 27.4%. Persons aged 60 and over are 5.3% of the total population. The respective population cohorts are calculated for the entire plan period.

Table 1.2: Population cohorts

	Description	Population estimates	Target population				
			2018	2019	2020	2021	2022
1	Total population		869,978	899,596	946,476	968,885	993,412
2	Total Number of Households		173,996	179,919	189,295	193,777	198,682
3	Children under 1 year (12 months)	3.65%	31,733	32,814	34,524	35,341	36,236
4	Children under 5 years (60 months)	17.62%	153,285	158,504	166,764	170,712	175,033
5	Under 15 year population	47.79%	415,773	429,928	452,332	463,042	474,763
6	Women of child bearing age (15 – 49 Years)	22.79%	198,274	205,025	215,709	220,816	226,406
7	Estimated Number of Pregnant Women	1.80%	33,056	34,181	35,962	36,814	37,746
8	Estimated Abortion Cases	0.3% of ANC Mothers	99	103	108	110	113
9	Estimated Number of Deliveries	1.80%	33,056	34,181	35,962	36,814	37,746

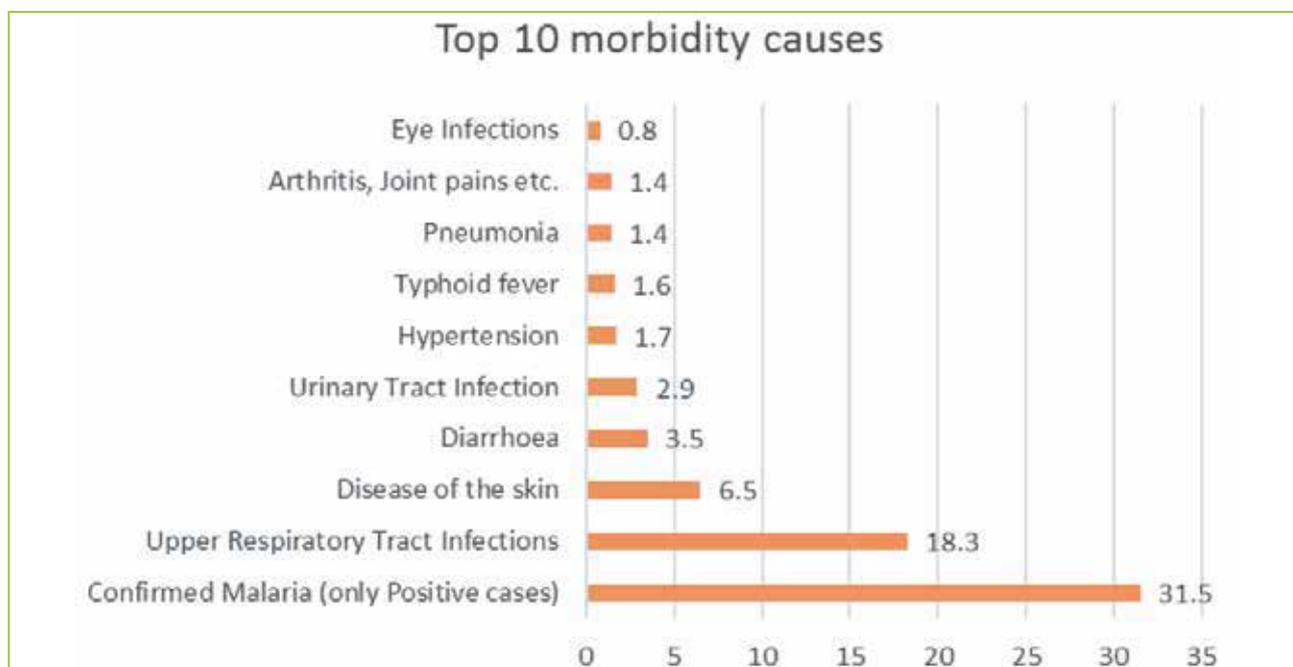
	Description	Population estimates	Target population				
			2018	2019	2020	2021	2022
10	Estimated Live Births	3.80%	33,056	34,181	35,962	36,814	37,746
11	Total Number of Adolescents (10-19)	25.83	224,703	232,353	244,462	250,250	256,585
12	Total number of Youths	20.12%	175,076	181,036	190,471	194,980	199,916
13	Adults (25-59)	27.39%	238,250	246,361	259,199	265,336	272,053
14	Elderly (60+)	5.30%	46,134	47,704	50,190	51,379	52,679

Source: (CIDP, 2018)

## 1.4 Top ten major causes of morbidity and mortality in the County

The county is faced with a significant burden of both communicable and non-communicable diseases. Based on inpatients data from the health facilities in the county, Malaria remains the leading cause of death, with HIV/AIDS, Lower respiratory infections, Iron deficiency Anaemia and Diarrheal diseases following closely. The others are Premature and low birth weight, Ill-defined diseases, Birth asphyxia & birth trauma, Tuberculosis and Meningitis.

Figure 1.2: Top ten causes of morbidity in Busia County



Source: KHIS, 2018

Table 1.3: Top ten causes of morbidity in Busia County (in percentages)

Condition	Busia County (%)	National Coverage (%)
Malaria	13.6	5.7
HIV	8.6	10.5
Lower respiratory infections	7.4	9.0
Iron deficiency, Anaemia	6.8	3.3
Diarrhoeal diseases	6.4	3.9
Prematurity and low birth weight	6.4	3.7
Ill-defined diseases	5.8	3.6
Birth asphyxia and birth trauma	3.5	2.5
Tuberculosis	3.5	4.6
Meningitis	2.9	2.9

Source: (KHIS, March, 2018)

## 1.5 Nutrition situation analysis

The county government of Busia has prioritized enhancement of food and nutrition security in its County Integrated Development Plan 2018-2022 (CIDP). Among the key areas factored in the CIDP include improved access to nutrition services, mainstreaming HIV nutrition services and thus reduction of malnutrition. However, malnutrition remains a great hindrance to achievement of county development priorities.

The burden of malnutrition in Busia County is characterized by the co-existence of under nutrition as manifested by stunting, wasting, underweight, micronutrient deficiencies, overweight and obesity including Diet-Related Non-Communicable Diseases (DRNCD). Beyond poor diets and morbidity which are the immediate causes of malnutrition, underlies the socio-cultural, political and economic factors. These include but not limited to household food insecurity; inadequate care of vulnerable household members across different gender and age cohorts and cultural norms and practices influencing food perceptions, sharing and uptake. In Busia County for example, there is a growing perception that traditional nutritious foods are inferior to processed, imported foods. These processed, imported foods being more expensive than local vegetables, people have come to perceive local crops as food for the poor. Many mothers, as a result, sell their vegetables in order to buy mandazis (fried coconut buns) sodas, and chapatti (an unleavened flat bread,) under the impression that these foods are more healthful than traditional vegetables. Over time, people in the County have been producing and consuming fewer and fewer highly traditional nutritious foods. (The perception of local foods in Busia county, August 2015).

Poor access to clean water, hygiene and sanitation; inadequate health services; poor health seeking behaviour and care practices among men and women across all ages and diversities; low community and male support in relieving women of overburdening maternal workload; inadequate and inequitable access to nutrition and health education and information, unequal access, use and control of benefits from productive assets disproportionately affecting women and girls including their discrimination in decision making on issues pertaining their nutrition and wellbeing, make up part of the myriad issues leading to malnutrition, which must be addressed as part of effective and sustainable ways in addressing malnutrition. The overall expected result for the CNAP is for all residents of Busia County to achieve optimal nutrition for a healthier and better-quality life and improved productivity for the county's accelerated social and economic growth.

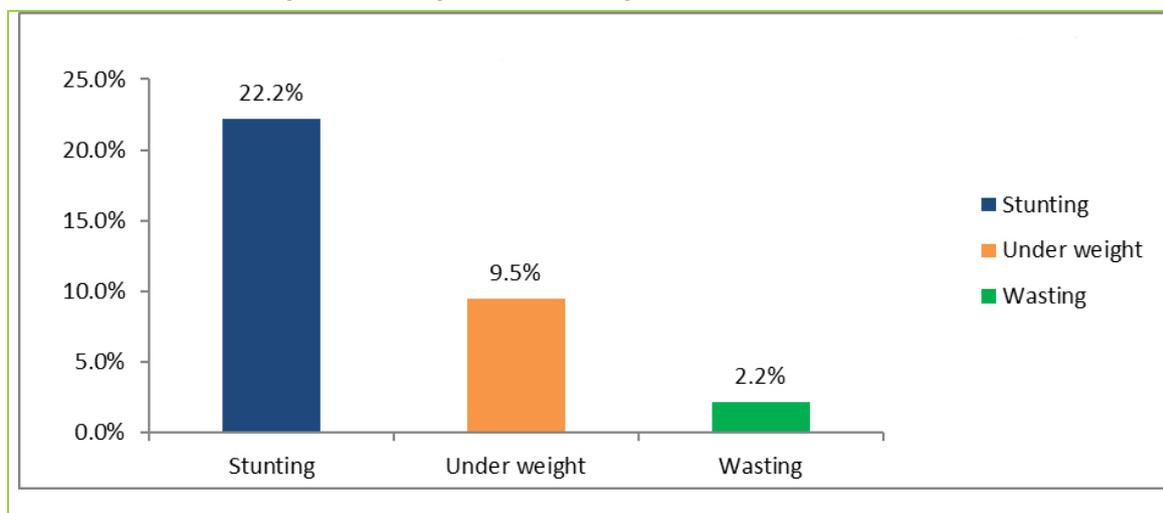
### 1.5.1 Trends in under nutrition

There are various forms of malnutrition which can co-exist in an individual. A child can be stunted as well as wasted, underweight and may suffer from one or more micronutrient deficiencies.

In Kenya, out of 7.22 million children under five years, nearly 1.9 million are stunted (26%); 290,000 are wasted (4%); 794,200 (11%) are underweight.

In Busia county, under nutrition affects mainly children and women especially during the first 1,000 days of life due to their high nutrient requirement. Stunting is the predominant form of malnutrition in Busia county standing at 22%, while 9.5% and 2.2% of the children aged below 5 years are underweight and wasted respectively (KDHS 2014.) as illustrated in the figure below;

Figure 1.3: Trend in stunting, underweight and wasting



Source: (KDHS 2014)

### 1.5.2 Drivers of nutrition trends

There are multiple drivers of the positive trends for stunting, wasting and underweight. They include:

1. Scaling up of a package of high impact interventions within the health system;
2. Scaling up nutrition sensitive interventions
3. Renewed focus on community-based programming for behavioural change
4. Increased focus on improved human development through building up and investing in human capabilities for improved food and nutrition security through an enabling framework for growth and employment based on gender equality, sustainability, productivity, empowerment, cooperation and security.
5. Improved environment for nutrition including better policies and strategies, better nutrition governance, gross Domestic Product (GDP) growth, and resilience programming among others

Twenty-eight percent (28%) of adults aged 18-69 years were either overweight or obese, with the prevalence in women being 38.5% and men 17.5%. Similar trends are seen when comparing the 2008-2014 KDHS. The proportion of women who were overweight or obese increased from 25% to 33% and those who were obese increased from 7% to 10% and obesity at 23.8%.

In Busia county, obesity and DRNCDs affect mainly women of reproductive age and adults in general. Because of ageing of body organs and systems, older persons too are at a very high risk of malnutrition. According to (AMPATH, 2018) baseline survey done in all the seven sub counties of Busia county, the prevalence of diabetes was at 1.7% being highest in adults 45-59 years while hypertension prevalence was at 33.6% being highest in females aged 70 years and above with the risk factor being overweight and obesity.

### 1.5.3 Trends in overweight, Obesity and diet related non-communicable diseases (DRNCDs)

The 2015 STEPs wise Survey confirmed an increasing rate of overweight/obesity and diet related non-communicable diseases (DRNCDs) in adults in Kenya.

### 1.5.4 Trends in Micronutrients deficiencies

Micronutrient status is very critical and has

impact in maternal and child survival. According to the Kenya National Micronutrient Survey of 2011, there is significant progress made in reducing the prevalence of micronutrient deficiencies except for zinc deficiency. The prevalence of anaemia was highest in pregnant women (41.6%), followed by children 6-59 months (26.3%) and school age children (5-14 years) at 16.5%. with iron deficiency was in being the predominant form of anaemia. The prevalence of other types of nutritional anaemia like folic acid and vitamin B12 deficiency was at 31.5% and 47.7% respectively among non-pregnant women aged 15-19 years. The prevalence of vitamin A deficiency among children 6-59 months was 9.2 while the prevalence of iodine deficiency in pre-school and non-pregnant women was 22.1% and 25.6% respectively.

According to the SMART survey conducted in Busia 2016, the level of anaemia in pregnancy was high, with more than quarter of women of reproductive being anaemic (41.6%). The Iron Folic Acid (IFAS) coverage was at 47.6 % thus almost half are not receiving IFAS. Vitamin A supplementation during Malezi Bora was 80.3% (KHIS 2019). However, routine supplementation coverage is still low as low as 20%. The Kenya Mortality Study March 2018 cited iron deficiency anaemia among the top ten causes of morbidity in Busia county being rated at number 4 at 6.8 % against the national 3.3%.

In addition to ensuring improved health service provision, there is dire need to incorporate nutrition sensitive interventions to address the underlying non-medical issues affecting increased uptake of micronutrients by mothers. In Busia county, socio- economic vulnerabilities especially among women and girls leading to poor utilization and or frequency of antenatal health care services; long distances to the health facilities; age and literacy levels; low knowledge, inadequate counselling and clarity on the importance of different micronutrient supplements before, during and after pregnancy; beliefs against consuming medications during pregnancy; low/lack of male and community support on maternal and child health, including lack of support for teenage mothers to seek health services in a timely manner. Further, collection and use of context-based gender analysis on the underlying socio-cultural, economic and rights related issues affecting affordability and improved uptake of nutrition and related health services and practices to inform gender transformative nutrition interventions is paramount.

### 1.5.5 Trends in feeding practices among children below five years and Adults.

Exclusive breastfeeding rates in Kenya have markedly improved from 32% in 2008-09 to 61% in 2014. (KDHS, 2014). Of all preventive interventions, exclusive breastfeeding can have the single largest impact on reducing the deaths of children under five from all causes. Improving breastfeeding is critical to child health, development and survival. It would annually save about 823,000 children under 5 years of age; 87% of them among infants less than 6 months of age; Reduce infection related mortality (<3months) by 88%; Prevent more than 54% of all diarrhoea episodes and 72% of all admissions for diarrhoea; Prevent against 57% of all admissions for respiratory infections; Acute otitis media (<2 years), Malocclusion, Type 2 diabetes and Obesity (Lancet series, 2013).

In Busia County, the proxy exclusive breastfeeding rates as per KHIS 2014 were at 44% with boys at 45% and girls at 54%.

In 2016 SMART survey EBF was at 47% with boys reported at 48.4% and girls 51.6%. This shows that girls are more exclusively breastfed than boys though the gap has narrowly reduced. This is still way below the national set targets of 80 percent (MOH, 2012).

Early initiation of breastfeeding in Busia County stands at 80.3% (SMART survey 2016). The minimum acceptable diet for children as per the household survey of 2018 is at 32% which is an increase from 20% (SMART survey 2016). The women dietary diversity score in Busia has increased from 44.3 percent (SMART survey 2016) to 48% as per the 2018 household survey.

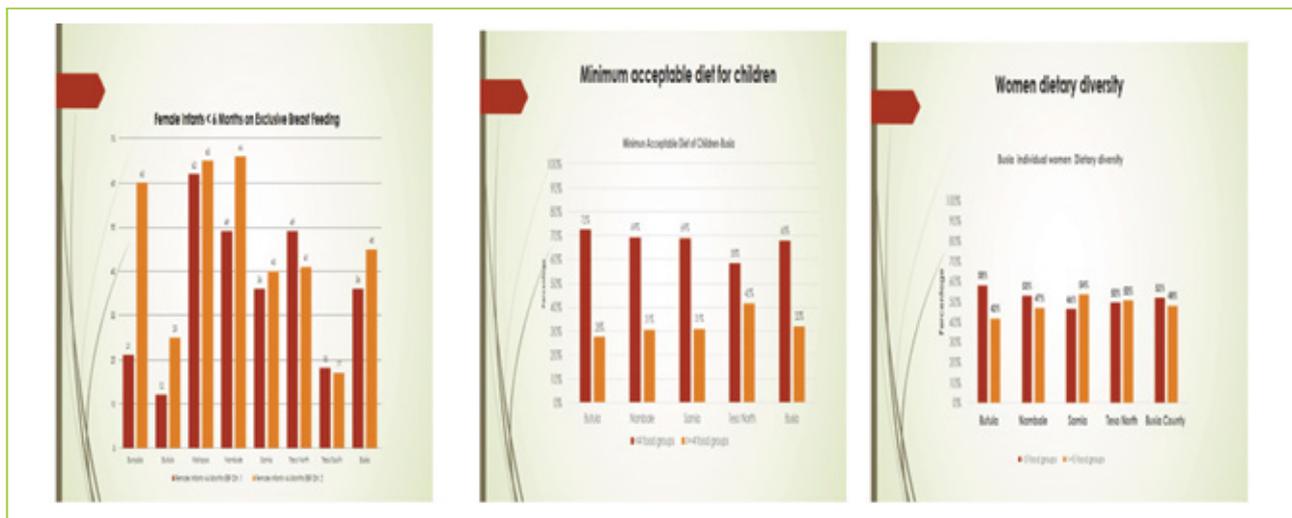
Studies have shown a strong linkage between social-cultural and economic factors and improved nutrition especially for women and young children, which must be addressed for effective and sustainable optimal Maternal, infant and young children's nutrition and wellbeing. (Action Against Hunger gender analysis report, 2017). Gender roles and responsibilities between men and women resulting to overburdening maternal workload for women and girls, with limited community and male support lead to limited time for women and girls of reproductive age, especially PLWs to practice optimal care and feeding practices for themselves and their young children. Water scarcity and food insecurity aggravated by unequal social systems and deep rooted gender inequalities that have a wide range influence to unequal access to, ownership of and control over benefits from productive resources and decision making disproportionately affecting women and girls in the county, has a great impact on maternal and infant and young children care and feeding practices.

Further cultural norms, beliefs and practices such as food sharing and uptake related stereotypes, perceptions and practices affects maternal, infant and young children optimal dietary diversity through locally available and affordable nutritious foods. Levels of knowledge on nutrition among men

women across different ages and diversities, further greatly determines the level of support especially by men and other key influencers within communities, which is key in prompting increased uptake of optimal nutrition and health care and practices by women and children in the county. Thus in addition to improved health and nutrition service provision, renewed focus to

integrate interventions in nutrition programming to identify and address the underlying gender inequalities and socio-economic issues across communities in Busia county is prerequisite towards realizing improved MIYCF outcomes.

Figure 1.4: Minimum acceptable diets and exclusive breastfeeding



## KDHS, 2014

### Agriculture and access to food

Kenya experiences 20-30% deficit in staple food every year and is increasingly depending on food imports (30-40%) to bridge the national deficit. (NFNSP IF). Although trends in household food security (availability, accessibility, utilization and stability) have generally improved over the last three decades, and economic growth has been generally positive. Food insecurity persists due to stagnation of agricultural production, low use of agricultural technology, high food prices, frequent disasters and the effects of climate change on the mainly rain-fed agriculture.

Food security in Busia County is affected by; seasonality with rapid deterioration during dry months resulting to emergency levels of acute malnutrition; unplanned land use where agricultural land is being turned into commercial use; increase in population compared to the same land size. The county has also been facing challenges related to crop infestation as seen with the fall army worm outbreak of 2016/2017; Market access has shown variation

across the county as a factor of several issues such as poor coverage of infrastructure, trade and fiscal policies. The county is experiencing up to 20% post-harvest loss.

Agriculture, fishing and trade are the main economic activities in Busia County. Being the entry points between Kenya and Uganda, Busia and Malaba towns are thriving trade towns where livestock, agricultural products and manufactured goods are traded. Busia County's climate is conducive for agriculture. Some of the crops that are grown within the county in small scale include maize, beans, sweet potatoes, millet, cassava, cotton, tobacco, rice and sugar cane. Fishing is a major economic activity in Busia with Lake Victoria being the main source of both Nile Perch and Tilapia. However, the agricultural land in Busia is being converted to human settlement. Due to high population growth, most of the original large-scale farms have been subdivided beyond economically sustainable production capacities (2.7 hectares) with a large proportion of the population owning less than 0.6 hectares. Gender equality

and women empowerment is an important and long overdue stimulus to a more inclusive human development and accelerated economic growth. In Busia county, existence of social systems, ;cultural norms and beliefs which are discriminative against women and girls forms part of the major detrimental factors to improved social-economic development in the county. Women, girls and the youth have limited autonomy and unequal participation in major decision making processes as strong agents for improved food and nutrition security. In as much as women contribute to close to 80% labour in crop production, they have unequal access to, use and control over benefits from productive assets such as land and livestock, low access and inclusion in use of new food production systems and technologies as well as inadequate access to affordable credit and farm inputs. Youth currently constitute 38% of the total population. Limited involvement of youth in gainful employment and economic participation as well as their exclusion and marginalization from decision making process and policies is a threat to the stability not only to the county but the entire nation. Strategies to equally train and engage men and women across different ages and diversities on climate-smart sustainable gardening technologies, enhancing their knowledge on the nutritional value of under-utilized traditional foods, recipes and preparation methods and sustainable income-generating activities will go along way in realizing increased food security and improved dietary diversity as well as increased purchasing power of households, enhanced asset building mechanism, access to market

and other social infrastructures.

## 1.6 Health services

The government of Kenya has put in place initiatives to accelerate the provision of health care. These include free maternity services for pregnant mothers. In Busia County, pregnant mother who delivers under skilled delivery is at 56.9%. Only 12% of the entire population deliver in hospitals reflecting low access to maternal services in the county. Those who seek these services in health centres are estimated to be 0.9%, as those who attend dispensaries/clinics are at 3.3%. However, it is important to note that deliveries by skilled birth attendants has improved gradually; with a decline in 2016/2017. There is still low coverage of ANC services with a total of 49.6 percent of pregnant mothers attending 4 Antenatal clinics.

. Maternal workload, preference of Traditional Birth Attendants to skilled health care workers during delivery, socio-economic vulnerability among women, long distances to hospitals, lack of 24-hour maternity services, poor attitudes among health care workers, cultural beliefs and high level teenage pregnancies with limited support from family and community have been identified as some of the social factors affecting deliveries in a health facility by skilled health care workers. This calls for interventions to address the socio-cultural and economic issues affecting demand, access and uptake of skilled delivery services by women and girls, for increased optimal uptake of maternal, neonatal and health and nutrition related services and practices in the county.

# CHAPTER TWO: COUNTY NUTRITION ACTION PLAN (CNAP) FRAMEWORK

## 2.1 Introduction

Malnutrition is caused by factors which are broadly categorized as immediate, underlying and basic. Immediate causes of malnutrition include disease and inadequate food intake; this means that disease can affect nutrient intake and absorption, leading to malnutrition, while not taking sufficient quantities and the right quality of food can also lead to malnutrition.

The underlying causes are food insecurity-including availability, economic access and use of food; feeding and care practices-at maternal, household and community level; and environment and access to and use of health services (World Health Organization, and The World Bank, 2012). Household food insecurity implies that there is lack of access to **enough**, , safe, nutritious food to support a healthy and active life. The level of nutrition awareness among mothers or caregivers and other influencers affects the child feeding and care practices, consequently impacting on their nutrition. Similarly, poor access to and utilization of health services as well as environmental contaminants brought about by inadequate water, poor sanitation and hygiene practices, influence the nutrition of households.

Lastly, the basic causes of malnutrition which act at the enabling environment on macro level include issues such as knowledge and

evidence, politics and governance, leadership, infrastructure and financial resources in general nutrition specific interventions address the manifestation and immediate causes; nutrition sensitive interventions the underlying causes and enabling environment interventions the basic or root causes of malnutrition.

Nutrition is neither a sector nor a domain of one ministry or discipline but a Multisectoral and multi-disciplinary issue that has many ramifications from the individual, household, community national to global levels.

Addressing all forms of malnutrition at all three levels of causation (immediate, underlying and basic) requires Triple-duty actions that have the potential to improve nutrition outcomes across the spectrum of malnutrition, through integrated initiatives, policies and programmes. The potential for triple-duty actions emerges from the shared drivers behind different forms of malnutrition, and from shared platforms that can be used to address these various forms. Examples of shared platforms for delivering triple-duty actions include health systems, agriculture and food security systems, education systems, social protection systems, WASH systems and nutrition sensitive policies, strategies and programs. Strategies for integration of nutrition specific interventions and sensitive interventions have been tested and proven to work.

Figure 2.1: Conceptual framework for malnutrition

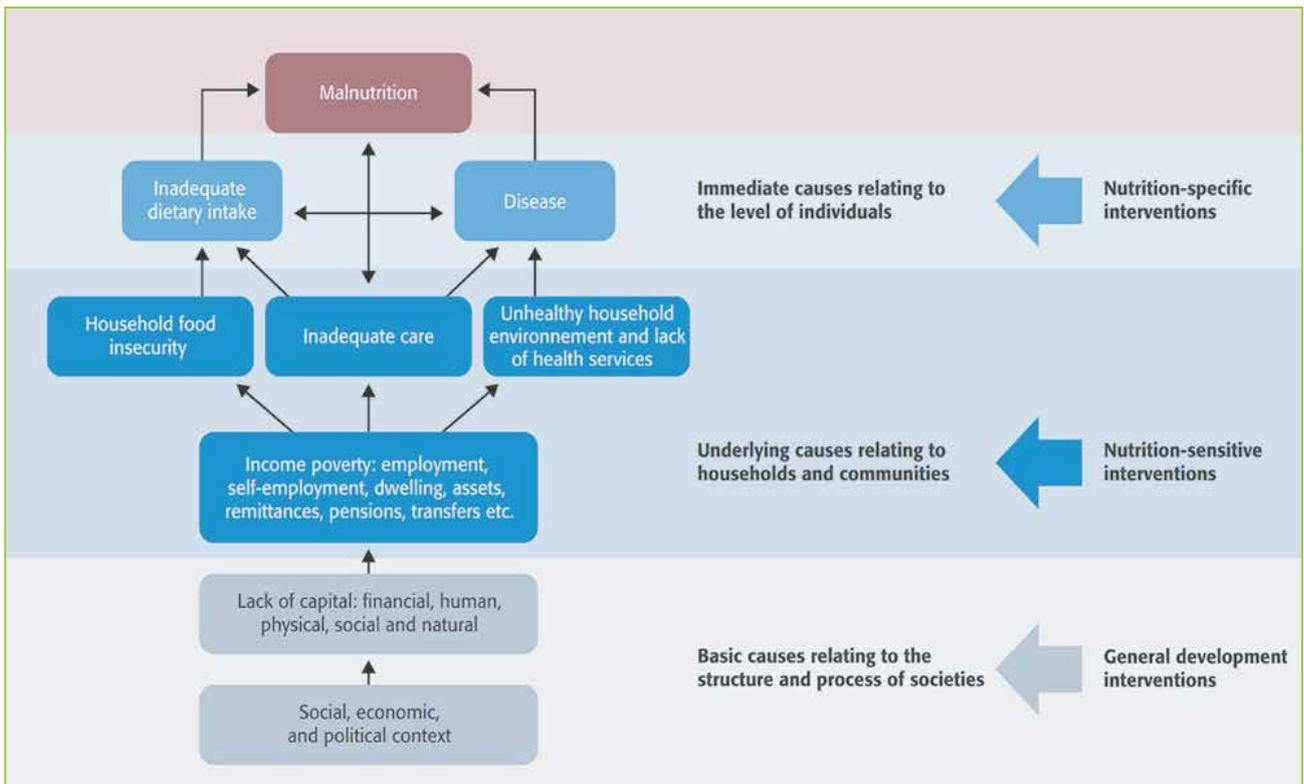


Figure 6 Conceptual framework for malnutrition, UNICEF

## 2.2 Vision, County Mission and Core Values

### 2.2.1 Vision

A healthy, productive and internationally competitive county

### 2.2.2 County Mission

A progressive, sustainable, technologically driven, evidence-based and client-centered nutrition system with the highest attainable standards of health at all levels of care.

### 2.2.3 Core Values

- Trustworthiness
- Customer-centeredness
- Teamwork
- Effective communication
- Integrity, and a positive attitude

## 2.3 CNAP Rationale

The CNAP was developed to further accelerate and scale up efforts towards the elimination of malnutrition as a problem of public health significance Busia county. The three basic rationales for the action plan are:

- **The health consequences** – improved nutrition status leads to a healthier population and enhanced quality of life;
- **Economic consequences** – improved nutrition and health is the foundation for rapid economic growth.
- **Ethical argument** – optimal nutrition is a human right.

There is overwhelming evidence that improving nutrition contributes to economic productivity

and development and poverty reduction by improving physical work capacity, mental capacity and school performance. Improving nutrition is tremendous value for money as it reduces the costs related to lost productivity and health care expenditures.

Globally, it is estimated that each dollar spent on nutrition delivers between USD 8 and USD 138, which is a cost–benefit ratio of around 1:17, similar to that of infrastructure development like roads, railways and electricity.

## 2.4 Objectives of CNAP

The objective of the CNAP is to contribute to the national agenda for KNAP in accelerating and scaling up efforts towards the elimination of malnutrition in Kenya in line with Kenya’s Vision 2030 and sustainable development goals, focusing on specific achievements by 2022. The expected result or desired change for the CNAP is that ‘The entire population of Busia county achieve optimal nutrition for a healthier and better quality of life and improved productivity for the county’s accelerated social and economic growth. The key strategies that will be adopted in the implementation of CNAP will include;

- Life-course approach to nutrition programming which is a holistic approach to nutrition issues for all population groups
- Gender mainstreaming towards ensuring consistent application of gender transformative approaches across all interventions in all sectors
- Coordination and partnerships targeting sectoral and multisectoral approaches to enhance programming across various levels and sectors,
- Integration which will consider the various platforms in place to deliver deliver gender transformative nutrition responsive to the specific nutrition and health related needs of populations across different gender age and diversities , e.g., health centers, schools and at the community level.
- Capacity strengthening for implementation of nutrition services responsive to the specific needs of men and women across different

ages and diversities targeting service providers and related systems

- Advocacy, communication and social mobilization thus acknowledging that nutrition improvements require political goodwill for increased investments and raising population-level awareness, , their increased support and participation for improved food and nutrition security for all.
- Promoting equity and human rights especially among vulnerable and marginalized populations in effort to ensure that every person is free from hunger and have adequate food of acceptable quality including equitable access to quality health services.
- Resilience and risk-informed programming that focus on anticipating, planning and reducing disaster risks to effectively protect persons, communities, livelihoods and health
- Monitoring, evaluation, accountability and learning (MEAL) hence promotion of use of the triple A (assessment, analysis & action) cyclic process to provide feedback, learn lessons and adjust strategy as appropriate
- Empowerment for sustainability of results – the need to ensure predictable flow of resources, develop technical and managerial capacity of implementers, motivate implementers, ensure vertical and horizontal linkages, and gradual exit when exiting an intervention.

## 2.5 CNAP development process

The development of CNAP was driven by county department of health, nutrition unit with involvement of other health units as well as the line ministries (Agriculture, Education, Water, social protection and gender). The process also ensured that the CNAP is results-based and provides for a common results and accountability framework for performance-based M&E. Evidence was gathered through desk reviews of relevant documents and information from key sectors

## 2.5.1 Nutrition through the life course approach

Nutritional needs and concerns vary during different stages of life from childhood to elderly years. Nutritional requirements in the different segments of the population can be classified into the following groups which correspond to different parts of the lifespan, namely; pregnancy and lactation, infancy, childhood, adolescence, adulthood, and old age

The development of this CNAP had been through intensive consultation to in order capture nutritional requirements of individuals or groups across different gender, age and diversities living in the county. The CNAP has considered the following factors: Physical activity — whether a person is engaged in heavy physical activity; age and sex of the individual or group; body size and composition, Geography; and Physiological states, such as pregnancy and lactation.

From infancy to late life, nutritional needs change. Children must grow and develop, while older adults must counter the effects of aging. The importance of age, gender and diversity -appropriate nutrition during all stages of the life cycle cannot be overlooked. It is against this background that this action plan is development taking into consideration nutrition needed per specific appropriate stages of life to capture and optimize the heterogeneity of nutrition needed per specific appropriate stages of life with regard to gender, age and diversities, other socio-economic factor cultural and physiological determinants and dimensions..

## 2.5.2 Gender mainstreaming

Gender and nutrition are inextricable parts of the vicious cycle of poverty and it's an important cross-cutting issue. Gender inequality are a cause as well as an effect of malnutrition and hunger. Higher levels of gender inequality are associated with higher levels of undernutrition, both acute and chronic undernutrition. Gender equality is firmly linked to enhanced productivity, better development outcomes for future generations, and improvements in the functioning of institutions. Studies examining the relationship between gender inequality, nutrition and health have consistently shown that gender-related factors have an effect on nutrition and health related outcomes. The domains of gender equality

such as gender roles and responsibilities leading to overburdening maternal roles and responsibilities among women and girls, limited opportunities to engage in competitive and skilled productive work especially among women and youth; beliefs, attitudes and norms pertaining to the way women and men relate to each other within the household or community; lack of autonomy in decision-making, power and idea sharing; unequal access to, use and control over productive economic resources, services and opportunities by women and girls and attitudes about or experience of genderbased violence disproportionately affecting women, girls and children have been observed to have an far-reaching influence on nutrition and health related outcomes.

In any given society, men and women across different ages and diversities equally have a role to play in realizing good nutrition and health.

However, the distinct roles and relations of women, girls, men and boys of different ages and diversities in a given culture, may bring about differences that give rise to inequalities in access to and uptake of optimal nutrition and health related services and practices, especially for women, girls and children. Other factors such as child/forced marriages and teenage pregnancy accounting for 21% in the county has a strong nexus to malnutrition both for the vulnerable teenage mothers and their newborns.

In addition, other socio-economic and cultural factors such as poverty, girls' levels of education with non-schooling adolescents and those with primary school level education being more vulnerable, low use of contraceptives among adolescents, marriage has significant influence on the probability of increased incidences of teenage pregnancies which remain a key driver of school drop outs among girls and consequently leading to a cycle of poverty which is a serious prerequisite for malnutrition in Busia county (Determinants of teenage pregnancies: the case of Busia District in Kenya)

Further, weak inter-sectoral linkages; inadequate gender integration in nutrition assessments, surveys/research; inconsistent collection and use of sex-age disaggregated nutrition data leads to lack of evidence based decision making and the design of tailor made nutrition and health interventions responsive to the specific

nutrition needs, priorities, challenges while building on the existing capacities, experience and knowledge among men and women of different age and diversities.

In order to achieve effective and sustainable nutrition and health outcomes, the CNAP seeks to integrate a gender transformative approach through effective gender mainstreaming at all levels of nutrition and health interventions.

Specifically, this nutrition action plan has used mix approaches to a larger extent integrate gender in the development process and the final action plan. These include: -

- The use of the life cycle approach “all residents of Busia, throughout their life-cycle enjoy at all times safe food in sufficient quantity and quality to satisfy their nutritional needs for optimal health”. Using the life-course approach, the action identifies key nutrition interventions for each age cohort and provides the linkages of nutrition to food production and other relevant sectors that impact on nutrition.
- Ensuring nutrition programming at all levels in Busia County is consistently informed by context based gender analysis defining the gender issues and relations relating to the specific nutrition needs and priorities of men and women of different ages and diversities across the county
- Specific strategies, interventions and activities are prioritized with in the CNAPs addressing nutrition needs specific to women, men, adolescents (boys and girls) giving weight to identification and addressing the socio-cultural and economic vulnerabilities, technology and political barriers to achieving gender equality in areas of human rights, equal participation of men and women in key decision processes pertaining to their nutrition and wellbeing, equal access, use and control over and benefit from resource development resources adequately respond to the specific nutrition and health related needs of women and men across all ages and diversities. Development and implementation of an SBCC strategy to address underlying socio-economic and cultural barriers and practices affecting improved and sustainable food, nutrition and health related outcomes in Busia county.
- Support interventions promoting increased male and community engagement on their role in supporting improved uptake of optimal nutrition and health practices at the household level, community and across the county at large.
- Strengthening health systems to improve delivery of gender responsive health services by health care workers as well as increased demand and equitable uptake of optimal nutrition and health services and practices, by men and women of all ages and diversities in Busia County.
- The CNAP development process has mainstreamed gender in its development process by making sure both females and males are invited and make meaningful participation all the stages of CNAP development, this include active participation in the inception meeting, writing and interventions prioritization meetings including validation, making the process inclusive and participatory with women and men having equal opportunity to in setting Nutrition agenda for Busia county.
- The common result and accountability framework for Busia CNAP has intentionally included indicators that are meant to monitor and evaluate gender transformative nutrition interventions for improved and sustainable nutrition and health related outcomes.
- Accountability for results is enhanced to improve transparency, leadership and the quality of statistics and information made available to the various stakeholders and the public by collecting sex age disaggregated data at all levels.

## 2.6 Target audience for CNAP

The target audience for the county nutrition action plan (CNAP) cuts across policy makers and decision makers both at national and county governments, donors and implementing partners of both nutrition specific and sensitive interventions, line ministries, county health management team, sub county health management teams, nutrition workforce in

health and other departments that influence and provide enabling environment for nutrition to be achieved and the communities at the grassroots level. This will enable them to understand what the county government is doing to ensure optimal nutrition for the entire population and what they can do individually to contribute to the effort.



# CHAPTER THREE: KEY RESULT AREAS (KRAs), STRATEGIES AND INTERVENTIONS

## 3.1 Introduction

The overall expected result or desired change for the CNAP is to contribute to the goal of KNAP 2018-2022 in achieving optimal nutrition for a healthier and better quality life and improved productivity for the country's accelerated social and economic growth. To achieve the expected result, a total of 10 key result areas (KRAs) have been defined for Busia County. The KRAs are categorized into three focus areas: (a) Nutrition-specific (b) Nutrition-sensitive and (c) Enabling environment, See, Table 3.1. The KRAs have been matched with corresponding set of expected outcomes and outputs, as well priorities activities per each of the KRA presented in see, section 3.3).

*Table 3.1: Prioritized KRAs per Focus Area*

CATEGORY OF KRAs BY FOCUS AREAS	KEY RESULT AREAS (KRAs)
Nutrition specific	1. Maternal, Infant and Young Child Nutrition (MIYCN) Scaled Up
	2. Nutrition in older children (5-9 years) and adolescents (10 – 19 years) promoted.
	3. Nutrition status of adults ( 20 – 59 years) and older persons ( 60 and above) promoted
	4. Prevention, control and management of Micronutrient Deficiencies in the county
	5. Prevention, control, management and rehabilitation of Diet Related Non-Communicable Diseases (DRNCDs).
	6. Strengthened Clinical and Community Nutrition and dietetics
Nutrition sensitive	7. Scaled up/ Strengthened nutrition in Agriculture, WASH, education department and social protection.
Enabling Environment	8. Strengthened nutrition information systems research learning and innovations
	9. Strengthened departmental and multi-departmental nutrition governance including coordination and legal/regulatory framework
	10. Strengthened Advocacy communication and social mobilization ( ACSM)

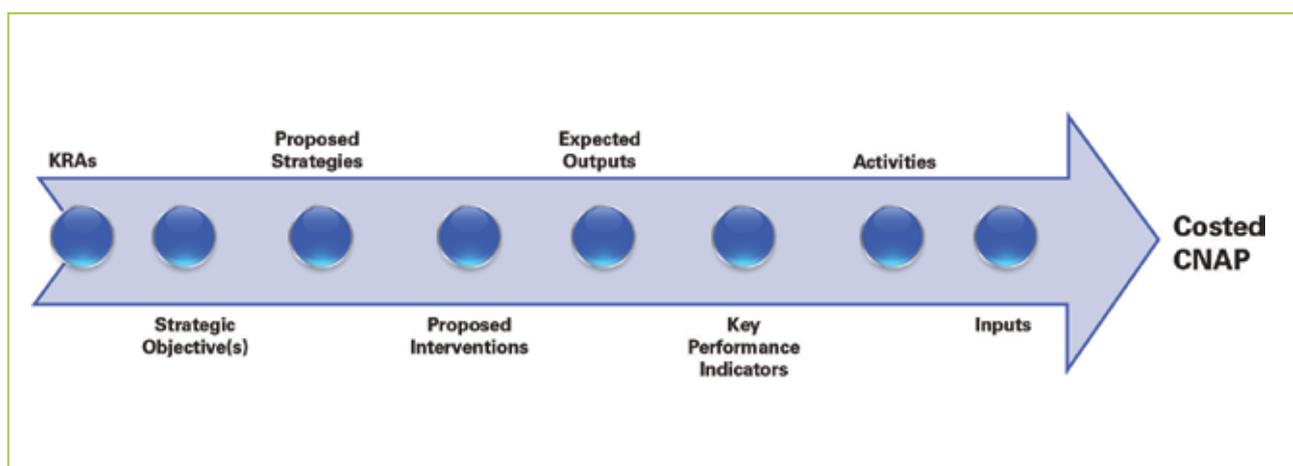
## 3.2 Theory of change and CNAP logic framework.

The “Theory of Change” (ToC) is a specific type of methodology for planning, participation, and evaluation that is used to promote social change – in this case nutrition improvement. ToC defines long-term goals and then maps backward to identify necessary preconditions. It describes and illustrates how and why a desired change is expected to happen in a particular context. The pathway of change for the CNAP is therefore best defined through the theory of change. The ToC was used to develop a set of result areas that if certain strategies

are deployed to implement prioritized activities using the appropriate then a set of results would be realized and if at scale, contribute to improved nutritional status of Busia residents.

The logic framework outlining the key elements and processes used to integrate ToC in the CNAP development is captured in figure 3.1. The expected outcome expected output and priorities activities in line with the process logic has been discussed in section 3.3

Figure 3.1: The CNAP Logic Process



### 3.3 Key result areas, corresponding outcome, outputs, and activities



#### Maternal, Infant, Young Child (0 - 59 months) Nutrition (MIYCN) scaled up

##### Expected outcome

Improved nutrition status of women of reproductive age (15-49 years) and children aged 0-59 months

##### Output 1

Enhanced capacity of health care workers and CHVs to provide quality MIYCN services

##### Activities

1. Sensitize key stakeholder and health managers on baby friendly community initiative (BFCI)
2. Train health care workers and community health volunteers (CHVs) on BFCI
3. Sensitize health managers on baby friendly hospital initiative (BFHI)
4. Train health workers on BFHI
5. Conduct BFCI internal and external assessments
6. Conduct on job training (OJT), mentorship and supportive supervision for BFHI
7. Conduct external assessment of BFHI activities
8. Train service providers on MIYCN
9. Sensitize county health management team (CHMT) and sub county health

management team (SCHMT) on PD-HEARTH

10. Sensitize key community gate keepers of PD-HEARTH
11. Train health care workers on PD-HEARTH
12. Train CHVs on PD-HEARTH
13. Train health care workers to effectively mainstream gender in nutrition programming for improved provision and implementation of gender responsive nutrition and health services and interventions.

##### Output 2

Improved detection of faltering growth for early identification and management of nutrition related conditions

##### Activities

1. Train health care workers, on growth monitoring and promotion
2. Train ECD teachers on growth monitoring and promotion
3. Train CHVs on growth monitoring and promotion
4. Conduct growth monitoring in ECD/ community

##### Output 3

Improved MIYCN knowledge and practices among caregivers and the community

## Activities

1. Implement PD hearth activities at community levels within community units
2. Conduct support supervision of PD-HEARTH
3. Establish community peer to peer support groups e.g. mother to mother, father to father support groups to be used as platforms for peer to peer support and health education on MIYCN.
4. Conduct community health and nutrition education targeting men for their increased engagement on their role and support on MIYCN.
5. Train community peer to peer support groups on agri-nutrition livelihoods activities and IGAs and link them to productive livelihood-based sectors and financial institutions for support.
6. Advocate for enforcement of school re-entry policy for teenage mothers at least 1 year after delivery to allow uptake of EF and optimal complementary feeding at the community level.
7. Strengthen the implementation of SBCC strategy on MIYCN.
8. Train mother to mother support group on IGAs, household based agri-nutrition technologies and linkages to other productive livelihood-based sectors and financial institutions for support.
9. Conduct cooking demonstrations in community
10. Sensitize the community on dietary diversification including production, preparation and uptake of locally available nutritious traditional foods.
11. Conduct outreaches to the community

## Output 4

Enhanced adherence to policies, legislations protecting, promoting and supporting breastfeeding at workplace and general population

## Activities

1. Sensitize health providers on

deworming

2. Sensitize CHMT, SCHMT, health care workers, CHVs and community on BMS act
3. Sensitize policy makers and government agencies at the boarder like KEBS on BMS Act
4. Sensitize managers of institutions and organizations on establishment of breast-feeding corners at work places
5. Set up breast feeding corners in health facilities
6. Advocate for enforcement of school re-entry policy for teenage mothers at least 1 year after delivery to allow uptake of EF and optimal complementary feeding



## Nutrition in older children (5-9 years) and adolescents (10 – 19 years) promoted.

### Outcome

Improved nutrition status of older children (5-9 years) and adolescent (10-19 years)

### Output 1

Increased knowledge of health care workers and school management on optimal nutrition requirements of older children and adolescents

### Activities

1. Train health teachers on nutrition in older children and adolescents
2. Sensitize stakeholders, school heads, principles and religious teachers on adolescent nutrition
3. Mentor school health teachers and matrons on nutrition in older children and adolescents

### Output 2

Increased uptake of optimal nutrition among school going children and adolescents

### Activities

1. Conduct nutrition education and counselling of adolescent boys and girls in schools
2. Conduct nutrition education on health diets and physical activity for boys and girls of different age cohorts and

- diversities in schools
- 3. Train adolescent peers
- 4. Train youth groups (boys and girls) of different age and diversities on IGAs, Agri nutrition and water sanitation and hygiene (WASH)

Assess and enhance capacity of health care workers and teachers to offer youth friendly nutrition services and education

### Output 3

Increased uptake of iron and folic acid among adolescent girls through weekly iron folic acid supplementation

#### Activities

1. Train teachers on weekly iron folic acid supplementation (WIFs)
2. Train health care providers on WIFs
3. Train parents and other community members and leaders on WIFs.
4. Procure WIFs tablets for supplementation of adolescent girls in schools
5. Supplement adolescent girls in schools with WIFs
6. Monitor and evaluate the implementation of the WIFs programme in schools



### Nutrition status of adults (20 – 59 years) and older persons (60 and above) promoted.

#### Expected outcome

Improved nutrition status among adults and older persons

### Output 1

Increased awareness among the community and health care providers on optimal nutrition for adults and older persons

#### Activities

1. Conduct integrated community outreaches to educate the community on nutrition for adults and older persons
2. Sensitize the community on food diversification

3. Train CHVs and other community resource persons to promote healthy and sustainable diets at household level
4. Sensitize service providers at home for the aged on geriatric nutrition

### Output 2

Enhanced early detection of diet related communicable and non-communicable diseases among adults and older persons

#### Activities

1. Conduct integrated medical camps at the community level for education and screening of NCDs
2. Sensitize community leaders on regular medical check ups
3. Train health providers on geriatrics care
4. Procure nutrition assessment tools,

### Output 3

Improved linkage of vulnerable adults and older persons at the community with social support programs

#### Activities

1. Link adults, elderly and orphans and vulnerable children (OVC's) to social support programs
2. Train community members' groups on IGA's



### Prevention, control and management of Micronutrient Deficiencies in the county.

#### Expected outcome

Improved micronutrient status of the population

### Output 1

Increased intake of micronutrient rich foods.

#### Activities

1. Conducting barrier analysis for micronutrient uptake
2. Conduct bottleneck assessment for low uptake of micronutrient
3. Develop and disseminate key messages targeting men and women across different ages and diversities on consumption of diversified micronutrient rich foods based on identified barriers

4. Conduct social behavior change communication activities to promote increased micronutrient uptake
5. Conduct campaigns at the community targeting men and women across different ages and diversities on consumption of micronutrient diversified foods
6. Conduct nutrition counselling on at the community and facility

### Output 2

Increased intake of micronutrient supplements

#### Activities

1. Train Health workers on Vitamin A(VAS) and logistics management information system (LMIS)
2. Train CHVs on VAS
3. Conduct outreaches on VAS supplementation
4. Sensitize the community targeting men and women across different ages and diversities on VAS
5. Equip facilities with antenatal clinic (ANC) creening kits for anaemia
6. Provide iron folic acid supplementation (IFAS) and micronutrient powders (MNPs) supplements to children under-fives
7. Procure micronutrient supplements (Vitamin A, IFAS, MNPs)
8. Procure micronutrient powders
9. Advocate for inclusion of supplements (Vitamin A, IFAS, MNPs) in the emergency medical supplies (EMS) list
10. Carry out support supervision of Malezi bora activities

### Output 3

Increased consumption of fortified foods

#### Activities

1. Sensitize public health officers on monitoring of fortified foods <sup>all</sup>
2. Monitor availability of fortified foods in the market
3. Conduct campaigns to promote consumption of fortified foods at levels
4. Procure iodine testing kits
5. Conduct salt iodization monitoring activity
6. Conducting trainings on income generating activities



## Prevention, control, management and rehabilitation of Diet Related Non-Communicable Diseases (DRNCDs).

### Expected outcome

Reduction in the prevalence of diet related none communicable diseases.

### Output 1

Improved knowledge of the health care workers and on management of diet related NCDs

#### Activities

1. Disseminate policies and guidelines on nutrition related NCDs
2. Train health workers on clinical nutrition therapy for NCDs
3. Hold performance review meeting with health care workers for nutrition related NCDs

### Output 2

Increased awareness of the population on prevention, and management of NCDs

#### Activities

1. Commemorate world diabetes and cancer day
2. Conduct CMEs on importance of physical exercises in management on NCDs for clients attending at the facility
3. Conduct food safety surveillance
4. Hold dialogue meetings to discuss prevention and control of NCDs
5. Conduct sensitization meetings on nutrition with NCD support groups
6. Conduct screening sessions at the community outpatient development (OPD) for NCDs
7. Conduct sensitization meetings to the community members on importance of healthy diets and physical activities
8. Conduct sensitization sessions with CHVs on diet therapy for NCD clients
9. Conduct nutrition education on prevention, control and management of DRNCDs targeting men and women across different ages and diversities.



## Strengthened Clinical and Community Nutrition and dietetics

### Expected outcome

Improved access to quality clinical nutrition and dietetics services

### Output 1

Improved competencies, skills and knowledge of nutritionists and dieticians on clinical nutrition

#### Activities

1. Train HCW on nutrition care process
2. Train nutrition staff on specialised clinical nutrition courses
3. Conduct OJTs at the health facilities

### Output 2

Enhanced standards of quality of nutrition and dietetics services for inpatients

#### Activities

1. Develop individualized standards operating procedures for provision of clinical nutrition and dietetics
2. Conduct quality assurance for provision of clinical nutrition in all facilities
3. Conduct periodic quality assurance reviews meetings with all nutrition in-charges from the county sub county hospitals
4. Sensitize the community on the importance of nutrition in disease management
5. Develop and disseminate in-patient feeding protocol to all managers, procurements officers, health care workers and other relevant stakeholders
6. Dissemination of clinical nutrition and dietetics tools
7. Print and distribute clinical nutrition monitoring and reporting tools

### Output 3

Improved access to quality nutrition focused HIV services to all clients at facility and community level

### Activities

1. Train TOTs on HIV nutrition focused therapy
2. Train HCW on HIV focused nutrition therapies
3. Scale up nutrition screening service points for HIV
4. Sensitize CHVs on assessment and referral of clients of HIV and TB clients

### Output 4

Improved access to quality nutrition focused TB services to all clients at facility and community level

#### Activities

1. Train TOTs on TB nutrition focused therapy
2. Train HCW on TB focused nutrition therapies
3. Scale up nutrition screening service points for TB
4. Sensitize CHVs on assessment and referral of HIV/TB clients

### Output 5

Improved coverage of IMAM services

#### Activities

1. Training of the CHVs on IMAM including affective identification, documentation and addressing underlying social cultural and economic factors contributing to malnutrition, affecting optimal adherence to IMAM services and relapse by MAM/SAM patients.
2. Train HCW on IMAM including affective identification, documentation and addressing underlying social cultural and economic factors contributing to malnutrition, affecting optimal adherence to IMAM services and relapse by MAM/SAM patients.

### Output 6

Optimal logistic management of commodities and equipment for clinical nutrition services

## Activities

1. Train HCWs on LMIS for IMAM, HIV, TB and clinical nutrition
2. Purchase and distribution of anthropometric equipment
3. Purchase of nutrition supplement and therapeutic commodities
4. Procure and distribute nutrition commodities for clinical nutrition management
5. Procure enteral and parenteral nutrition commodities



## Scaled up/Strengthened nutrition in Agriculture, WASH, education department and social protection.

### Expected outcome

Nutrition linkages with other sensitive sectors strengthened

### Output 1

Nutrition integrated in education

#### Activities

1. Sensitize BOM on optimal nutrition for school going children including school meals guidelines
2. Train teachers in learning institutions and ECDE centres on school meals guidelines
3. Train teachers on optimal nutrition for school going children
4. Collaborate with teachers to include nutrition component in 4K clubs
5. Collaborate with agriculture and education to promote establishment of integrated demonstration gardens in schools
6. Sensitize teachers in ECDE centres on growth monitoring, vitamin A supplementation and deworming
7. Conduct growth monitoring, Vitamin A supplementation and deworming in ECDE centres in collaboration with teachers
8. Collaborate with education to develop a joint monitoring tool for nutrition activities in schools
9. Carry out joint nutrition monitoring activities in schools and ECDE Centres

### Output 2

Nutrition integrated in Agriculture

#### Activities

1. Collaborate with agriculture extension staff to promote consumption of diversified foods through nutrition education and cooking demonstrations
2. Train extension staff and the community members on climate smart agriculture technologies in line with nutrition
3. Training on climate smart
4. Train Agriculture extension staff on key nutrition messages for agriculture
5. Set up demonstration gardens at selected health facility levels
6. Establish demonstration gardens
7. Develop a joint monitoring tool for agri-nutrition
8. Carry out impact assessment on nutrition in agricultural interventions
9. Train the community on post-harvest management
10. Train the community on preparation and utilization of locally available foods
11. Train the community on value addition
12. Train the extension officers on preparation and utilization of locally available foods
13. Train the farmers on setting up of household kitchen gardens

### Output 3

Nutrition integrated in water sanitation and hygiene (WASH)

#### Activities

1. Train health care workers on essential Hygiene Actions (household water treatment methods, food safety and hygiene, proper storage of water, environmental hygiene, hand washing at critical times and sanitation)
2. Train CHVs on essential hygiene
3. Train water user association (WUA) on essential hygiene and household water treatment
4. Conduct advocacy meeting targeting health management on allocation of resources for integrated nutrition

#### WASH activities

5. Trigger the schools, and community to integrate nutrition in WASH activities through community led total sanitation (CLTS) and Sanitation marketing
6. Document, report and share nutrition WASH best practices
7. Conduct field survey to establish the current situation of rainfall water storage
8. Carry out joint support supervision for nutrition WASH activities
9. Advocate for equal engagement of men and women across different diversities in decision making in the design and installation of water supplies to ensure easy and equitable access to safe water by all, and in support of reduced maternal workload among women for improved uptake of health and nutrition care and hygiene practices.

#### Output 4

##### Nutrition integrated in social protection

##### Activities

1. Collaborate with the Social Protection department to link the older persons, persons living with disabilities and OVCs to social protection programmes (Inua Jamii)
2. Consolidate key nutrition messages
3. Document and share best practices
4. Conduct joint monitoring and evaluation visits
5. Strengthen collaboration and coordination of nutrition in Social Protection
6. Train social protection and nutrition staff on the monitoring tool
7. Train staffs in the homes of the elderly, children homes and special schools on nutrition in the life cycle
8. Conduct joint assessments of institutions for older persons, persons living with disabilities and OVCs



#### **Strengthened nutrition information systems research learning and innovations**

#### Expected outcome

Sectoral and multisectoral nutrition information systems, learning and research strengthened.

#### Output 1

Strengthened coordination for tracking progress of CNAP implementation

##### Activities

1. Hold Quarterly multi-sectoral nutrition collaboration TWG meetings at county level for tracking progress of nutrition activity implementation
2. Hold gender sensitive and responsive AWP development meetings
3. Conduct multisectoral/departmental data review meetings
4. Conduct mid and end term review for CNAP implementation
5. Conduct mapping for nutrition activities
6. Implementation of the nutrition specific and sensitive activities

#### Output 2

Strengthened use of evidence-based data for nutrition programming

##### Activities

1. Train health care workers in nutrition information generation and reporting at source
2. Train health care workers on nutrition data quality management
3. Train health care workers on KHIS and other departmental reporting systems
4. Conduct gender integrated KAPS
5. Conduct gender integrated standardized monitoring and assessment of relief and transition (SMART) survey
6. Conduct gender integrated nutrition capacity assessment
7. Conduct research on nutrition therapy on NCDs
8. Conduct context based gender analysis on gender, age and diversity, socio-cultural and economic determinants in nutrition and health.

### Output 3

Enhanced information sharing on nutrition and dietetics

#### Activities

1. Establish portal for nutrition data anchored in the County website
2. Develop a website for nutrition
3. Produce biannual nutrition newsletter

### Output 4

Enhanced monitoring of implementation of the CNAP

#### Activities

1. Carry out support supervision during international and national days e.g. world breastfeeding and malezi bora week
2. Conduct support supervision
3. Avail nutrition data collection and reporting tools



### Strengthened departmental and multi-departmental nutrition governance including coordination and legal/regulatory framework

#### Expected outcome

Efficient and effective nutrition governance, coordination and legal and M &E frameworks in place

#### Output 1

Efficient and effective nutrition governance, coordination and legal frameworks in place.

#### Activities

1. Convene multisectoral meetings on nutrition
2. Carry out stakeholder forums on nutrition
3. Incorporate WASH, agriculture, education, gender and social protection focal person in county nutrition technical forum (CNTF)

4. Hold county nutrition technical forums (CNTF) and sub county nutrition technical forums (SCNTF)
5. Conduct dissemination meeting to county, sub county SCHMT and community on prioritization of nutrition in planning
6. Disseminate policies, strategies and guidelines to departments, line ministries, SCHMT, healthcare workers and community members
7. Conduct mentorship and supportive supervision



### Strengthened Advocacy communication and social mobilization (ACSM)

#### Expected outcome

Enhanced commitment and continued prioritization of nutrition in the county agenda

#### Output 1

Advocacy communication and social mobilization for nutrition conducted

#### Activities

1. Develop county specific communication strategy for nutrition
2. Conduct high level advocacy meeting for budgetary allocation to nutrition
3. Hold targeted fund advocacy meeting with various County Assembly committee members (health, gender, agriculture, education, water)
4. Conduct high level meeting with key county decision makers to advocate for equitable recruitment of male and female nutrition staff
5. Conduct radio talk shows
6. Hold community dialogue/action days.
7. Conduct Malezi bora activities to promote maternal child health and nutrition (MCHN) services
8. Mark nutrition health days
9. Train health care workers and CHVs on social behaviour change and communication (SBCC)
10. Print and distribute nutrition specific age, gender and diversity sensitive IEC materials
11. Produce age, gender and diversity sensitive information education and communication (IEC) materials
12. Resource mobilize for nutrition interventions from county government and partners.

# CHAPTER FOUR: MONITORING, EVALUATION, ACCOUNTABILITY AND LEARNING

## 4.1 Introduction:

This chapter provides guidance on the monitoring, evaluation, accountability and learning process, and how the monitoring process will inform the county nutrition action plan. The CNAP will evolve as the county assesses data gathered through monitoring.

Monitoring and evaluation systematically tracks the progress of suggested interventions, and assesses the effectiveness, efficiency, relevance and sustainability of these interventions. Monitoring is the ongoing, routine collection of information about a program's activity in order to measure progress toward results. That information tells us if a change occurred (the situation got better or worse) which, in turn, helps in making more informed decisions about what to do next. Regular monitoring helps in detection of obstacles resulting in data-driven decisions, on how to address them. A program may remain on course or change significantly based on the data obtained through monitoring. Monitoring and evaluation therefore forms the basis for modification of interventions and assessment of the quality of activities being conducted.

It is critical to have a transparent system of joint periodic data and performance reviews that involves key health stakeholders who use the information generated from it. In order to ensure ownership and accountability, the nutrition program will maintain an implementation tracking plan which will keep track of review and evaluation recommendations and feedback. Stakeholders may include donors, departments, staff, national government and the community. Involvement of stakeholders contributes to better data quality because it reinforces their understanding of indicators, the

data they expect to collect, and how those data will be collected. In addition, it helps to ensure that their user needs will be satisfied.

An assessment of the technical M&E capacity of the program within the county is key. This includes the data collection systems that may already exist and the level of skill of the staff in M&E. It is recommended that approximately 10% of a program's total resources should be slated for M&E, which may include the creation of data collection systems, data analysis software, information dissemination, and M&E coordination.

## 4.2 Background and Context:

The CNAP outlines expected results, which if achieved, will move the county and country towards attainment of the nutrition goals described in the global commitment e.g. WHA, SDGs, NCDs, and national priorities outlined in the KNAP and Food and Nutrition Security Policy. It also described the priority strategies and interventions necessary to achieve the outcomes, strategy to finance them, and the organizational frameworks (including governance structure) required to implement the plan.

## 4.3 Purpose of the MEAL Plan:

The CNAP MEAL Plan aims to provide strategic information needed for evidence-based decisions at county level through development of a Common results and Accountability framework (CRAF). The CRAF will form the basis of one common results framework that integrates the information from the various sectors related to nutrition, and other non-state actors e.g. Private sector, CSOs, NGOs; and external actors e.g. Development partners, technical partners resulting in overall improved

efficiency, transparency and accountability.

While the CNAP describes the current situation (situation analysis), and strategic interventions, the MEAL Plan outlines what indicators to track when, how and by whom data will be collected, and suggests the frequency and the timeline for collective, program performance reviews with stakeholders.

Elements to be monitored will be disaggregated by sex and age, and will include:

- Service statistics disaggregated by sex, age and diversity of the target population.
- Service coverage/Outcomes
- Client/Patient outcomes (behaviour change, morbidity)
- Clients equitable access to and uptake of quality services
- Quality of health services responsive to the specific needs of men and women across different ages and diversity.
- Impact of interventions in response to the specific nutrition and health needs of men and women across different ages and diversities.

The evaluation plan will elaborate on the periodic performance reviews/surveys and special research that complement the knowledge base of routine monitoring data. Evaluation questions, sample and sampling methods, research ethics, data collection and analysis methods, timing/schedule, data sources, variables and indicators are discussed.

In effort to ensure gender integration at all levels of the CNAP, all data collected, analyzed, and reported on will be broken down (disaggregated) by sex and age to provide information and address the impact of any gender issues and relations including benefits from the nutrition programming between men and women. Sex disaggregated data and monitoring can help detect any negative impact of nutrition programming or issues with targeting in relation to gender, age and diversity. Similarly,

The nutrition program will share their quarterly progress reports with the county department of health (CDOH) M&E unit, who will take lead in the joint performance reviews at subnational level. The county management teams will prepare the quarterly reports and in collaboration with county stakeholders and organize the county quarterly performance review forums. These reports will

positive influences and outcomes from the interventions supporting gender equality for improved nutrition and health outcomes shall be documented and learned from to improve and optimize interventions. Other measures that will be in place to ensure a gender responsive MEAL plan will include:

- Development / review M&E tools and methods to ensure they document gender differences.
- Ensuring that terms of reference for reviews and evaluations include gender-related results.
- Ensuring that M&E teams (e.g. data collectors, evaluators) include men and women as diversity can help in accessing different groups within a community.
- Reviewing existing data to identify gender roles, relations and issues prior to design of nutrition programming to help set a baseline.
- Holding separate interviews and FGDs with women and men across different gender, age and diversities including other socio-economic variations.
- Inclusion of verifiable indicators focused on the benefits of the nutrition programming for women and men.
- Integration of gender-sensitive indicators to point out gender-related changes leading to improved nutrition and related health outcomes over time.

#### 4.4 MEAL Team

The County M&E units or equivalent will be responsible for overall oversight of M&E activities. The functional linkage of the nutrition program to the department of health and the overall county intersectoral government M&E will be through the county M&E TWG. Health department M&E units will be responsible for the day to day implementation and coordination of the M&E activities to monitor this action plan.

be shared with the national M&E unit during the annual health forum, which brings together all stakeholders in health to jointly review the performance of the health sector for the year under review.

For a successful monitoring of this action plan, the county will have to strengthen their M&E function by investing in both the infrastructure and the human resource for M&E. Technical capacity building for data analysis could be promoted through collaboration with research institutions or training that target the county M&E staff. Low reporting from other sectors on nutrition sensitive indicators is still a challenge due to the use different reporting systems that are not inter-operational. Investment on Health Information System (HIS) infrastructure to facilitate e-reporting is therefore key. Timely collection and quality assurance of health data will improve with a team dedicated to this purpose.

## 4.5 Logic Model

The logic model looks at what it takes to achieve intended results, thus linking result expected, with the strategies, outputs and inputs, for shared understanding of the relationships between the results expected, activities conducted and resources required.

Figure 4.1: The Logic Model

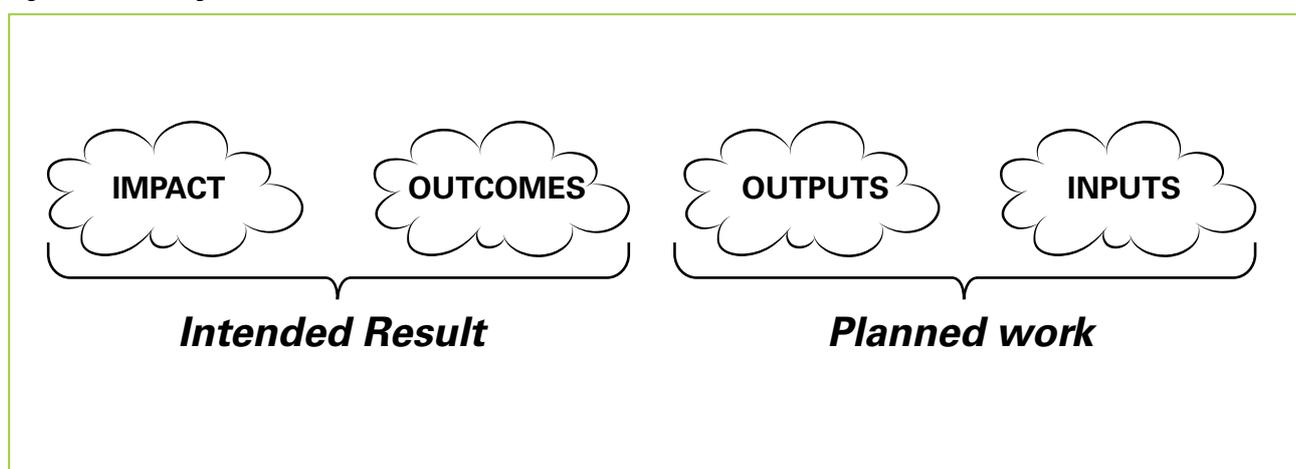


Table 4.1: CNAP RESULTS FRAMEWORK

<b>OUTCOMES</b>	<b>Outcome 1.</b> <b>Reduction in undernutrition:</b>	<b>Outcome 2.</b> <b>Reduction of micronutrient deficiencies :</b>	<b>Outcome 3.</b> <b>Reduction in overnutrition and NCDs</b>	<b>Outcome 4.</b> <b>Improved leadership, governance, and coordination</b>	<b>Outcome 5.</b> <b>Reduction in mortality and morbidity due to diseases through nutrition interventions.</b>	<b>Outcome 6.</b> <b>Reduction in mortality and morbidity due to acute malnutrition</b>
	<ul style="list-style-type: none"> <li>• Reduce prevalence of stunting among children under five years by 40%;</li> <li>• Reduce and maintain childhood wasting to less than 5%;</li> <li>• Reduce and maintain childhood underweight to less than 10%;</li> <li>• Improved nutrition status of older children, adolescents, adults and older persons</li> </ul>	<ul style="list-style-type: none"> <li>• Reduce anaemia in children 0-59 months by 30%</li> <li>• Reduce anaemia in adolescent girls by 30%</li> <li>• Reduce folic acid deficiency among non-pregnant women by 50%</li> <li>• Reduce vitamin A deficiency in children by 50%</li> <li>• Reduce iodine deficiency among children &lt;5 years by over 50%</li> <li>• Reduce prevalence of zinc deficiency among pregnant women by 10%</li> </ul>	<ul style="list-style-type: none"> <li>• A 10% relative reduction in prevalence of insufficient physical activity</li> <li>• Reduced prevalence of diet related NCDs</li> </ul>	<ul style="list-style-type: none"> <li>• Increased domestic financing for nutrition</li> <li>• Increased human resource for nutrition</li> <li>• Efficient and effective nutrition governance, coordination and legal frameworks in place.</li> </ul>	<ul style="list-style-type: none"> <li>• Optimized quality of patient care and improved clinical outcomes through prevention and treatment of hospital malnutrition</li> </ul>	<ul style="list-style-type: none"> <li>• Maintain mortality rates at below 3% for MAM and 10% for SAM</li> </ul>

<b>OUTPUTS</b>	<b>Outputs</b>	<b>Outputs</b>	<b>Outputs</b>	<b>Outputs</b>	<b>Outputs</b>	<b>Outputs</b>
	<p>-Enhanced capacity of health care workers and CHVs to provide quality MIYCN services</p> <p>- Improved detection of faltering growth for early identification and management of nutrition related conditions;</p> <p>- Improved MIYCN knowledge and practices among caregivers and the community</p> <p>- Enhanced adherence to policies, legislations protecting, promoting and supporting breastfeeding at workplace and general population</p> <p>- Increased knowledge of the school management and teachers on optimal nutrition requirements of older children and adolescents</p> <p>- Increased uptake of optimal nutrition among school going children and adolescents</p>	<p>I Increased uptake of iron and folic acid among adolescent girls through weekly iron folic acid supplementation</p> <p>- Increased intake of micronutrient rich foods.</p> <p>- Increased intake of micronutrient supplements</p> <p>- Increased consumption of fortified foods</p>	<p><b>Outputs</b></p> <ul style="list-style-type: none"> <li>Increased awareness among the community and health care providers on optimal nutrition for older persons</li> <li>Enhanced early detection of diet related communicable and non-communicable diseases among adults and older persons</li> <li>Improved linkage of vulnerable adults and older persons at the community with social support programs</li> <li>Improved knowledge of the health care workers on management of diet related NCDs</li> </ul>	<p><b>Outputs</b></p> <p>-Strengthened coordination for tracking progress of implementation of CNAP</p> <p>- Strengthened use of evidence-based data for nutrition programming</p> <p>- Enhanced information sharing on nutrition and dietetics</p> <p>- Enhanced monitoring of implementation of the CNAP</p>	<p><b>Outputs</b></p> <p>- Improved competencies, skills and knowledge of nutritionists and dieticians on clinical nutrition</p> <p>- Enhanced standards of quality of nutrition and dietetics services for inpatients</p> <p>- Improved access to quality nutrition focused HIV/ TB services to all clients at facility and community level</p> <p>- Optimal logistic management of commodities and equipment for clinical nutrition services</p>	<p><b>Outputs</b></p> <ul style="list-style-type: none"> <li>Improved coverage of IM/AM services</li> </ul>

INPUTS	1. Organization of service delivery for nutrition;	7. Nutrition research;
	2. Human Resource for Nutrition;	8. Nutrition leadership;
	3. Nutrition infrastructure;	9. Household access to better quality and quantity of resources;
	4. Nutrition products and Technology;	10. Financial, human, physical and social capital;
	5. Nutrition Information;	11. Socio cultural, economic and political context
	6. Nutrition Financing;	

## 4.6 Calendar of key M&E Activities

The county will adhere to the health sector accountability cycle. This will ensure the alignment of resources and activities to meet the needs of different actors in the health sector.

### A. Updating of the Framework

Regular update of the M&E framework will be done based on learnings experienced along the implementation way.

It will be adjusted to accommodate new interventions to achieve any of the program-specific objectives. A mid-term review of the framework will be conducted in 2020/21 to measure progress of its implementation and hence facilitate necessary amendments.

### B. Indicators and Information Sources

The indicators that will guide monitoring of the implementation of CNAP are presented in table 4.3.

## 4.7 Monitoring process

In order to achieve a robust monitoring system, effective policies, tools, processes and systems should be in place and adequately disseminated. The collection, tracking and analysing of data thus making implementation effective to guide decision making. The critical elements to be monitored are: Resources (inputs); Service statistics; Service coverage/Outcomes; Client/Patient outcomes (behaviour change, morbidity); Investment outputs; Access to services; and impact assessment.

The key monitoring processes will incorporate inputs from various stakeholders as outlined, and will involve:



### i. Data Generation

- Various types of data will be collected from different sources to monitor the implementation progress. These data are collected through routine methods, surveys, sentinel surveillance and periodic assessments among others.
- Routine data will be generated using the existing mechanisms and uploaded to the DHIS monthly.
- Strong multi-sectoral collaboration with nutrition sensitive sectors.
- Data flow from the primary source through the levels of aggregation to the national level will be guided by reporting guidelines and SOPs.
- Data from all reporting entities should reach MOH by agreed timelines for all levels.

## ii. Data Validation

- Data validation through checking or verifying whether or not the reported progress is of the highest quality and ensure that data elements are clear and captured in various tools and management information systems, through regular data quality assessment. Annual and Quarterly verification process should be carried out, to review the data across all the indicators.

## iii. Data analysis

- This step ensures transformation of data into information which can be used for decision making at all levels. Data analysis will be done during the continuous monitoring, and during evaluations. Products of the analysis will be user specific, targeting a variety of audiences.

## iv. Information dissemination

- Information products developed will be routinely disseminated to key sector stakeholders and the public as part of the quarterly and annual reviews to get feedback on the progress and plan for corrective measures.

## v. Stakeholder Collaboration

- There is need to effectively engage other relevant Departments and Agencies and the wider private sector in the health sector M&E process.
- Each of these stakeholders generates and requires specific information related to their functions and responsibilities.
- The information generated by all these stakeholders is collectively required for the overall assessment of sector performance.

## 4.8 Monitoring Reports

The following are the monitoring reports and their periodicity:

Table 4.2: Monitoring reports

Process/Report	Frequency	Responsible	Timeline
<b>Annual Work Plans</b>	Yearly	All departments	End of June
<b>Surveillance Reports</b>	Weekly	DSSC and health facility in charges	COB Friday
<b>Health Data Reviews</b>	Quarterly	All departments	End of each quarter
<b>Monthly reports submissions</b>	Monthly	Facilities, CUs	5th of every month
<b>Quarterly reports</b>	Quarterly	All departments	After 21st of the preceding Month
<b>Bi-annual Performance Reviews</b>	Every six Months	All departments	End of January and end of July
<b>Annual performance Reports and reviews</b>	Yearly	All departments	Begins July and ends November
<b>Expenditure returns</b>	Monthly	All levels	5th of every month
<b>Surveys and assessments</b>	As per need	Nutrition program	Periodic surveys

## 4.9 Evaluation of the CNAP

Evaluation is intended to assess if the results achieved can be attributed to the implementation of CNAP by all stakeholders.

Evaluation ensures both the accountability of various stakeholders and facilitates learning with a view to improving the relevance and performance of the health sector over time.

A midterm review and an end evaluation will be undertaken to determine the extent to which the objectives of this CNAP are met.

### Evaluation Criteria

To carry out an effective evaluation of the CNAP, there will be need for clear evaluation questions. Evaluators will analyse relevance, efficiency, effectiveness and sustainability for the CNAP. The proposed evaluation criteria are elaborated on below;

**Relevance:** The extent to which the objectives of the CNAP respond to the specific needs for men and women across different ages and diversities including the vulnerable groups. It also includes an assessment of the responsiveness considering changes and shifts caused by external factors.

**Efficiency:** The extent to which the CNAP objectives have been achieved with the appropriate amount of resources

**Effectiveness:** The extent to which CNAP objectives have been achieved, and the extent to which these objectives have contributed to the achievement of the intended results. Assessing the effectiveness will require a comparison of the intended goals, outcomes and outputs with the actual achievements in terms of results.

**Sustainability:** The continuation of benefits from a outlined interventions after its termination.

Table 4.3 highlights the common results and accountability framework that will be used to monitor the CNAP.

Table 4.3: Common Results and Accountability Framework

BUSIA CNAIP COMMON RESULTS AND ACCOUNTABILITY FRAMEWORK 2018/19-2022/23										
KEY RESULT AREA 1: Scaled up Maternal, Infant, Young Child ( 0 - 59 months) Nutrition (MIYCN)										
IMPACT/Outcome	Indicator	Baseline (2018)	Mid-term Target (2020)	End-Term target (2022)	Data Source	Frequency of data collection	Responsible person			
Reduce and maintain childhood wasting to less than 5%	Prevalence of wasting (W/H >2SD) in children 0-59 months (%)	4% (GBD 2015)	Maintain at less than 5%	Maintain at less than 5%	GBD	Every 2 years	Nutrition program			
Reduce prevalence of stunting among children under five years by 40%	Prevalence of stunting in children 0-59 months (%)	23% (GBD 2015)	18%	13.8%	GBD	Every 2 years	Nutrition Program			
Increased proportion of mothers and caregivers who practice optimal behaviour for improved nutrition of WRA.	Proportion of population with an acceptable household food consumption score (Minimum dietary Diversity (MDD).	88.8% (KDHS 2014)	90%	95%	KDHS	Every 5 years	Nutrition Program			
Outcome	Indicator	Baseline (2018)	Mid-term Target (2020)	End-Term target (2022)	Data Source	Frequency of data collection	Responsible person			
		Number of HCWs trained on BFHI	36	160	320	Departmental reports	Annually	Head, Nutrition Program		
		Number of CHVs trained on BFCI	No Data	200	350	Program reports	Annual	Head, Nutrition Program		
Enhanced capacity of health care workers and CHVs to provide quality MIYCN services	Number of external assessments conducted of BFHI activities	0	10	20	Program reports	Annual	Head, Nutrition Program			

BUSIA CNAP COMMON RESULTS AND ACCOUNTABILITY FRAMEWORK 2018-2022

Improved detection of faltering growth for early identification and management of nutrition related conditions;	Percentage of children under 5 attending the child welfare clinic who are underweight	No Data	40%	25%	KHIS	Quarterly	Nutrition Program
	Total number of children under 5 who are weighed	335,189	450,000	600,000	KHIS	Monthly	Nutrition Program
Improved MIVCN knowledge and practices among caregivers and the community	Number of ECD teachers trained on growth monitoring	432	622	1002	Departmental reports	Annually	Head, Nutrition Program
	Percentage of children 0-6 months exclusively breastfed	31% (2017)	45%	75%	GBD/KDHS	Every 3 years	Nutrition Program
	Proportion of New-born initiated on breast milk within the first one hour after delivery	93.5% KHIS 2018	95%	97%	KHIS	Quarterly	Nutrition Program
	Female Infants <6 Months Exclusive Breastfeeding (EBF)	38%	45%	65%	KHIS	Quarterly	Nutrition program
	Male Infants <6 Months Exclusive Breastfeeding (EBF)	36.9%	45%	65%	KHIS	Quarterly	Nutrition program
	number of community mother to mother support groups sensitized on dietary diversity	57	151	211	Departmental reports	Quarterly	Head, Nutrition Program

Enhanced adherence to policies, legislations protecting, promoting and supporting breastfeeding at workplace and general population	No. of HCWs sensitized on BMS Act	0	200	300	Program Reports	Annual	Nutrition Program
<b>KEY RESULT AREA 2: Nutrition in older children (5-9 years) and adolescents (10 – 19 years) promoted.</b>							
<b>Impact/Outcome</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Reduce anaemia in adolescent girls by 30%	Prevalence of anaemia in girls 15-19 years (%) Proportion of thin adolescents (falling below cut-off for BMI-for -age)	21 (KDHS 2014) No data	18 35%	15 25%	KDHS KDHS/Stepwise survey	Every 5 years Every Five years	Nutrition Program/KNBS Nutrition Program/NCD/KNBS
Reduce malnutrition in adolescent girls	Proportion of obese adolescents (falling above cut-off for BMI-for-age)	No Data	30%	15%	KDHS/Stepwise survey	Every Five years	Nutrition Program/NCD/KNBS
<b>Output</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Increased knowledge of the school management and teachers on optimal nutrition requirements of older children and adolescents	Number of school health teachers trained on nutrition in older and adolescents	0	70	210	Activity Reports	Annually	Head, Nutrition Program/ECD

Increased uptake of optimal nutrition among school going children and adolescents	Number of schools reached with education sessions on health diets and exercise	No Data	21	63	Activity Reports	Quarterly	Head, Nutrition Program/ECD
Increased uptake of iron and folic acid among adolescent girls through weekly iron folic acid supplementation	Proportion of adolescent girls in schools supplemented with WIFs	90%	92%	95%	Departmental/ Activity Reports	Monthly	Head, Nutrition Program
	Number of school principals and head teachers sensitized on WIFs	300	300	300	Departmental/ Activity Reports	Annually	Head, Nutrition Program
<b>KEY RESULT AREA 3: Nutrition status of adults (20 – 59 years) and older persons (60 and above) promoted.</b>							
<b>Outcome</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
A 10% relative reduction in prevalence of insufficient physical activity	Prevalence of insufficient physical activity in adults (%)	6.5%	6%	5%	Step-Wise Survey	Every 3 years	Nutrition Program
<b>Output</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Increased awareness among the community and health care providers on optimal nutrition for older persons	Number of health workers trained on geriatric nutrition Number of community groups trained on IGA's for sustainable nutrition	No Data No Data	320 63	640 105	Departmental/ Activity Reports Departmental Report	Annual Annual	Head, Nutrition Program Head, Nutrition Program/ Department of Agriculture
Enhanced early detection of diet related communicable and non-communicable diseases among adults and older persons	No of integrated medical camps conducted at the community	0	10	20	Departmental Report	Annual	Head, Nutrition Program/NCD Program/WASH

Improved linkage of vulnerable adults and older persons at the community with social support programs	No. of support groups integrating nutrition in their support groups	10	30	50	Departmental Report	Annual	Head, Nutrition Program/ Department of Agriculture
<b>KEY RESULT AREA 4: Prevention, control and management of Micronutrient Deficiencies in the county.</b>							
<b>Impact/Outcome</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Reduce folic acid deficiency among non-pregnant women by 50%	Proportion of non-pregnant women with folic acid deficiency (%)	39%	28%	20%	KDHS	Every 5 years	Nutrition Program/ KDHS
Reduce vitamin A deficiency in children by 50%	Prevalence of VAD in children 0-59 months (%)	9%	6%	4%	KNMS	Every 5 years	Nutrition Program/ KDHS
Reduce iodine deficiency among children <5 years by over 50%	Prevalence of iodine deficiency in children <5 years (%)	22%	15%	<10%	KNMS	Every 5 years	Nutrition Program/ KDHS
Reduce iodine deficiency among non-pregnant women by over 50%	Prevalence of iodine deficiency in non-pregnant women (%)	26%	15%	<10%	KNMS	Every 5 years	Nutrition Program/ KDHS
Reduce prevalence of zinc deficiency in pre-school children by 40%	Prevalence of zinc deficiency in children <5 years (%)	83%	65%	50%	KNMS	Every 5 years	Nutrition Program/ KDHS
<b>Output</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Increased intake of micronutrient rich foods.	Proportion of the population aware of dietary diverse foods	No Data	60%	75%	KAP Survey	Every 2 years	Nutrition Program
	Proportion of schools with community school gardens	No Data	40%	60%	Departmental Report	Annual	Head, Nutrition Program/ Department of Agriculture

Increased intake of micronutrient supplements	Percentage of pregnant women attending ANC receiving IFAS	81.3 (KHIS 2018)	85%	90%	KHIS	Quarterly	Nutrition Program	
	Vitamin A coverage for children 6-59 months	200% (KHIS 2018)	200%	200%	KHIS	Quarterly	Nutrition Program	
	Percentage of children under 5 with diarrhoea, treated with zinc and ORS	87.4%	90%	92%	KHIS	Quarterly	Nutrition Program	
	Proportion of children of school going age (6-14 years) dewormed	34.6	50%	65%	KHIS	Quarterly	Nutrition Program	
	Proportion of the households using iodized salt	No data	40%	60%	Departmental Report	Annual	Head, Nutrition Program	
Increased consumption of fortified foods	No. of public health officers sensitized on monitoring of food fortification	0	15	30	Departmental Report	Annual	Head, Nutrition Program	
<b>KEY RESULT AREA 5: Prevention, control, management and rehabilitation of Diet Related Non-Communicable Diseases (DRNCDs).</b>								
<b>Impact/Outcome</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>	
Reduced prevalence of diet related NCDs	Proportion of adults 18-69 years with raised fasting blood sugar (%)	No Data	1.9%	1.5%	STEPWise Survey 2015	Every 5 years	Nutrition Program/NCD Program	
	Proportion of men with normal waist: hip ratio (%)	No Data	73%	78%	STEPWise Survey 2015	Every 5 years	Nutrition Program/NCD Program	
	Proportion of women with normal waist: hip ratio (%)	No Data	64%	75%	STEPWise Survey 2015	Every 5 years	Nutrition Program/NCD Program	
	Prevalence of overweight/obesity in adults (18-69 years)	No Data	28%	20%	STEPWise Survey 2015	Every 5 years	Nutrition Program/NCD Program	
<b>Output</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>	

Improved knowledge of the health care workers on management of diet related NCDs	Number of dissemination meetings on policies and guidelines on diet related NCDs	0	2	4	Departmental Reports	Annual	Head, Nutrition Program/NCD Program
	Proportion of clients seeking outpatient services, screened for NCDs at OPD	No data	60%	75%	Departmental Report	Annual	Head, Nutrition Program/NCD Program
Increased awareness of the population on prevention and management of NCDs	Proportion of adults engaging in physical activity	No Data	50%	65%	STEPWise survey	Every 5 years	Head, Nutrition Program/NCD Program
	Proportion of NCD clients using nutrition therapy in managing the disease	No Data	75%	85%	Departmental Report	Annual	Head, Nutrition Program/NCD Program
<b>KEY RESULT AREA 6: Strengthened Clinical and Community Nutrition and dietetics in Disease management.</b>							
<b>Impact/Outcome</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Optimized quality of patient care and improved clinical outcomes through prevention and treatment of hospital malnutrition	Average Length of stay	12	10	8	KHIS	Annual	Nutrition Program
	Proportion of deaths among acutely children	0.2% for MAM 1.7% for SAM	0.2% for MAM 1.7% for SAM	0.2% for MAM 1.7% for SAM	KDHS	Every 5 years	Nutrition Program
<b>Output</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Improved competencies, skills and knowledge of nutritionists and dieticians on clinical nutrition	Number of health workers trained on clinical nutrition therapy	35	175	320	Departmental Report	Annual	Head, Nutrition Program

	Number of nutritionists trained on specialized nutrition	2	6	10	Departmental Report	Annual	Head, Nutrition Program
Enhanced standards of quality of nutrition and dietetics services for inpatients	Number of hospital food surveillance conducted	28	84	84	Departmental Report	Annual	Head, Nutrition Program
	Proportion of health facilities with in-patient feeding protocol		55%	65%	Departmental Report	Annual	Head, Nutrition Program
Improved access to quality nutrition focused HIV/TB services to all clients at facility and community level	Proportion of underweight HIV/TB clients	No data	40%	30%	Program reports	Annual	Head, Nutrition Program/HIV-TB Program
	Number of CHVs trained on nutrition assessment and referral of clients of HIV and TB clients	No Data	80	200	Program reports	Annual	Head, Nutrition Program/HIV-TB Program
Improved coverage of IMAM services	Number of HCWs trained on IMAM	120	360	500	Departmental Report	Annual	Head, Nutrition Program
	Proportion of health facilities offering Nutrition Assessment Counselling and Support (NACs)	40%	50%	60%	Departmental Report	Annual	Head, Nutrition Program
	Proportion of health facilities with integrated nutrition service delivery points	50%	60%	70%	Departmental Report	Annual	Head, Nutrition Program
Optimal logistic management of commodities and equipment for clinical nutrition services	Proportion of health facilities stocked with nutrition therapeutic commodities	100%	100%	100%	Departmental Report	Annual	Head, Nutrition Program
<b>KEY RESULT AREA 7: Scaled up/ Strengthened nutrition in Agriculture, WASH, education department and social protection.</b>							
Output	Indicator	Baseline (2018)	Mid-term Target (2020)	End-Term target (2022)	Data Source	Frequency of data collection	Responsible person
Nutrition integrated in education	Number of teachers trained on school meals and nutrition strategy and guidelines.	0	200	400	Program Reports	Annual	Nutrition Program/ Department of education

Nutrition integrated in Agriculture	Number of schools with 4K clubs	0	70	140	Departmental Report	Annual	Department of health, Nutrition Program/ Department of Education
	Proportion of Level 2 and 3 facilities with demonstration gardens	No Data	50%	70%	Departmental Report	Annual	Nutrition Program/ Department of Agriculture
Nutrition integrated in WASH	No of HCWs trained on essential hygiene actions	No Data	100	200	Departmental Report	Annual	WASH/Nutrition Program
Nutrition integrated in Social Protection	Proportion of older persons, people living with disability and OVCs linked with the social protection programs	30%	40%	60%	Departmental Report	Annual	Department of health, Nutrition Program, Social protection
Mainstream nutrition M&E in the relevant sector information systems and technical working groups.	Number of Multisectoral Nutrition TWG meetings held	2	4	8	Departmental Report	Annual	Department of health, Nutrition Program, M&E
<b>KEY RESULT AREA 8: Strengthened Nutrition Information Systems Research Learning and Innovations.</b>							
<b>Output</b>	<b>Indicator</b>	<b>Baseline (2018)</b>	<b>Mid-term Target (2020)</b>	<b>End-Term target (2022)</b>	<b>Data Source</b>	<b>Frequency of data collection</b>	<b>Responsible person</b>
Strengthened coordination for tracking progress of implementation of CNAP	No. of quarterly multisectoral nutrition performance review meetings held	0	8	16	Departmental Report	Annual	Department of health, Nutrition Program
Strengthened use of evidence-based data for nutrition programming	Number of HCWs trained on nutrition data generation and reporting	0	100	250	Departmental Report	Annual	Department of health, Nutrition Program
	Number of nutrition related surveys conducted (KAP, SMART)	0	2	4	Departmental Report	Every 2 Years	Department of health, Nutrition Program
Enhanced information sharing on nutrition and dietetics	County Nutritional repository Hub established	No	Yes	Yes	Departmental Report	Annual	Department of health, Nutrition Program

Enhanced monitoring of implementation of the CNAP	Number of nutrition supervision visits conducted by the CHMT.	0	56	112	Departmental Report	Annual	Department of health, Nutrition Program	
	Number of nutrition supervision visits conducted by the 7 SCHMT.	0	56	112	Departmental Report	Annual	Department of health, Nutrition Program	
<b>KEY RESULT AREA 9: Strengthened departmental and multi-departmental nutrition governance including coordination and legal/regulatory framework.</b>								
Output	Indicator	Baseline (2018)	Mid-term Target (2020)	End-Term target (2022)	Data Source	Frequency of data collection	Responsible person	
Efficient and effective nutrition governance, coordination and legal frameworks in place.	No. CNTF meetings held, that include representation from nutrition sensitive departments.	0	8	16	Departmental Report	Annual	Department of health, Nutrition Program	
	No. of meetings to disseminate nutrition policy and guidelines on nutrition.	0	2	4	Departmental Report	Annual	Department of health, Nutrition Program	
	Number of sub county NTF Meetings held in each of the 7 sub-counties.	0	56	112	Departmental Report	Annual	Department of health, Nutrition Program	
<b>KEY RESULT AREA 10: Strengthened Advocacy communication and social mobilization (ACSM).</b>								
Output	Indicator	Baseline (2018)	Mid-term Target (2020)	End-Term target (2022)	Data Source	Frequency of data collection	Responsible person	
Enhanced commitment and continued prioritization of nutrition in the county agenda	Proportion of health budget allocated to nutrition	<1%	3%	6%	County Budgets	Annual	Nutrition Program/County Department of Finance	

Output	Indicator	Baseline (2018)	Mid-term Target (2020)	End-Term target (2022)	Data Source	Frequency of data collection	Responsible person
	Number of new nutritionists recruited	-	15	30	County Public Service Board	Annual	Nutrition Program/County Public service Board
	County nutrition communication plan developed.	No	Yes	Yes	Departmental Report	Annual	Department of health, Nutrition Program
	Proportion of CNAP funded (Domestic and Partner)	-	70%	85%	Departmental Report	Annual	Department of health, Nutrition Program/ Department of Finance

#### 4.10 CNAP Implementation Plan

This chapter presents the summary of strategic objectives and the strategies to be used, the summary of indicators matrix and the Implementation matrix where it further highlights the implementing agencies and sources of funds for the plan. The chapter also gives the Sector's resource requirements. In order to implement this strategic plan effectively, the Sector will continue addressing structural bottlenecks and enhance capacity building within itself, engage all the stakeholders for their contribution and promote innovativeness, creativity and professionalism towards realization of the strategic plan.

The implementation of MEAL framework will be spearheaded by the county in collaboration with development partners and stakeholders. This will ensure successful implementation of the CNAP.

To ensure coordinated, structured and effective implementation of the CNAP, the county government will work together with partners and private sector to ensure implementation through:

- a) Develop standard operating procedures for management of data, monitoring, evaluation and learning among all stakeholders.
- b) Improve performance monitoring and review process
- c) Enhance sharing of data and use of information for evidence-based decision making

# CHAPTER 5: CNAP RESOURCE MOBILIZATION AND COSTING FRAMEWORK

## 5.1 Introduction

A good health system raises adequate revenue for health service delivery, enhances the efficiencies of management of health resources and provides the financial protection to the poor against catastrophic situations. By understanding how the health systems and services are financed, programs and resources can be better directed to strategically compliment the health financing already in place, advocate for financing of needed health priorities, and aid populations to access available health services.

Costing is a process of determining in monetary terms, the value of inputs that are required to generate a particular output. It involves estimating the quantity of inputs required by an activity/ programme. Costing may also be described as a quantitative process, which involves estimating both operational (recurrent) costs and capital costs of a programme. The process ensures that the value of resources required to deliver services are cost effective and affordable.

This is a process that allocates costs of inputs based on each intervention and activity with an aim of achieving set goals /results. It attempts to identify what causes the cost to change (cost drivers). All costs of activities are traced and attached to the intervention or service for which the activities are performed.

The chapter describes in detail the level of resource requirements for the strategic plan period, the available resources and the gap between what is anticipated and what is required.

## 5.2 Costing Approach

Financial resources need for the CNAP was estimated by costing all the activities necessary to achieve each of expected outputs in each of Key Result Area (KRA). The costing of the CNAP used result-based costing to estimate the total resource need to implement the action plan for the next five years. The action plans were costed using the Activity-Based Costing (ABC) approach. The ABC uses a bottom-up, input-based approach, indicating the cost of all inputs required to achieve Strategic plan targets. ABC is a process that allocates costs of inputs based on each activity, it attempts to identify what causes the cost to change (cost drivers); All costs of activities are traced to the product or service for which the activities are performed. The premise of the methodology under the ABC approach will be as follow; (i) The activities require inputs, such as labour, conference hall etc.; (ii) These inputs are required in certain quantities, and with certain frequencies; (iii) It is the product of the unit cost, the quantity, and the frequency of the input that gave the total input cost; (iv) The sum of all the input costs gave the Activity Cost. These were added up to arrive at the Output Cost, the Objective Cost, and eventually the budget.

The cost over time for all the thematic areas provides important details that will initiate debate and allow CDOH and development partners to discuss priorities and decide on effective resource allocation for Nutrition.

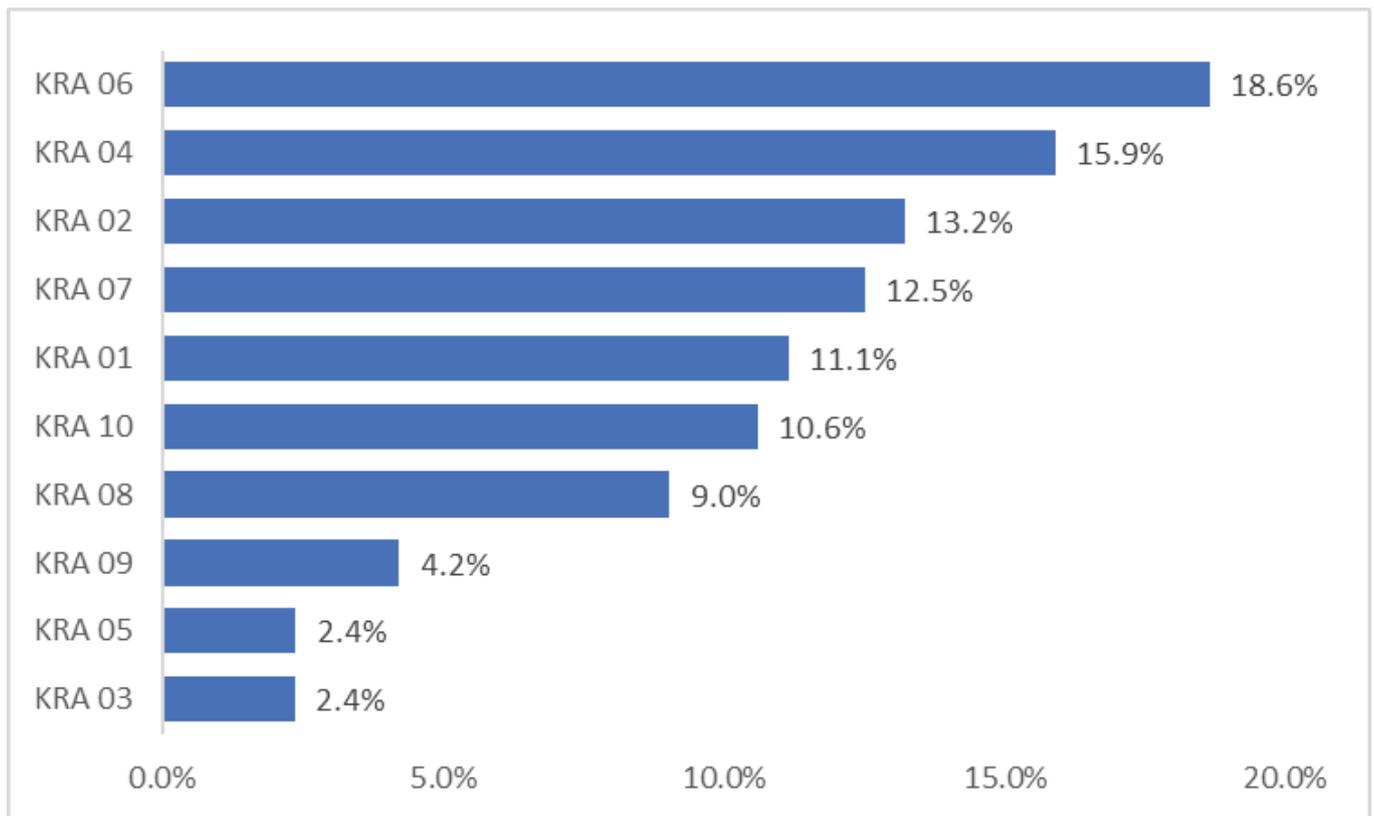
### 5.3 Total Resource Requirements (2018/19 – 2022/23)

The Strategic plan was costed using the Activity Based Costing (ABC) approach. The ABC uses a bottom-up, input-based approach, indicating the cost of all inputs required to achieve planned targets for the financial years of 2018/19 – 2022/23. The cost over time for all the Key Result Areas provides important details that will initiate debate and allow County health management and development partners to discuss priorities and decide on effective resource allocation. The KRAs provided targets to be achieved within the plan period and the corresponding inputs to support attainment of the targets. Based on the targets and unit costs for the inputs, the costs for the strategic plan were computed. The total cost of implementing Busia CNAP for the five years is estimated at KSh. 2.1 billion, See, and table 5.1. Further annual breakdown of cost requirement (s) is also presented by each of the output and activities is presented in annex Table A.

Table 5.1: Summary Cost by KRA

CATEGORY OF KRAs BY FOCUS AREAS	Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
<b>Nutrition specific</b>	KRA 01: Maternal, Infant, Young Child (0 - 59 months) Nutrition (MIYCN) scaled up	48,508,700	48,508,700	48,508,700	48,508,700	48,508,700	242,543,500
	KRA 02. Nutrition in older children (5-9 years) and adolescents (10 – 19 years) promoted.	57,403,600	56,220,500	57,604,600	58,959,500	57,394,600	287,582,800
	KRA 03. Nutrition status of adults (20 – 59 years) and older persons ( 60 and above) promoted.	10,288,000	11,280,000	9,222,000	10,288,000	10,288,000	51,366,000
	KRA 04. Prevention, control and management of Micronutrient Deficiencies in the county.	69,884,310	67,830,810	70,245,310	67,830,810	69,884,310	345,675,550
	KRA 05. Prevention, control, management and rehabilitation of Diet Related Non-Communicable Diseases (DRNCDs).	7,887,700	12,802,700	10,007,700	12,802,700	8,207,700	51,708,500
	KRA 06. Strengthened Clinical and Community Nutrition and dietetics	53,874,800	101,081,380	96,889,280	78,627,380	75,295,280	405,768,120
<b>Nutrition sensitive</b>	KRA 07. Scaled up/ Strengthened nutrition in Agriculture, WASH, education department and social protection.	54,040,950	56,354,950	53,971,700	53,971,700	53,971,700	272,311,000
	KRA 08. Strengthened Nutrition Information Systems Research Learning and Innovations.	30,770,413	40,833,213	44,323,323	36,166,213	44,323,323	196,416,485
<b>Enabling Environment</b>	KRA 09. Strengthened departmental and multi-departmental nutrition governance including coordination and legal/regulatory framework	18,124,000	19,069,000	18,124,000	18,124,000	18,124,000	91,565,000
	KRA 10. Strengthened Advocacy communication and social mobilization (ACSM).	45,359,000	48,451,200	46,738,000	45,134,000	45,134,000	230,816,200
	<b>Total</b>	<b>396,141,473</b>	<b>462,432,453</b>	<b>455,634,613</b>	<b>430,413,003</b>	<b>431,131,613</b>	<b>2,175,753,155</b>

Figure 5.1: Proportion of resource requirements by KRA



The annual break down of cost key result areas is presented in Table 5.1. KRA 06 on Strengthened Clinical and Community Nutrition and dietetics accounts for the highest proportion of total resources need accounting for 18.6 %. KRA 04 on Prevention, control and management of Micronutrient Deficiencies in the county. accounts for the 15.9% of the total resource requirement (See, figure 5.1).

### 5.3.1 Strategies to ensure available resources are sustained

Strategies to mobilize resources from new sources

- Lobbying for a legislative framework in the county assembly for resource mobilization and allocation
- Identification of potential donors both bilateral and multi-lateral
- Conducting stakeholder mapping
- Call the partners to a resource mobilization meeting
- Identification, appointment and accreditation of eminent persons in the community as resource mobilization good will ambassadors

Strategies to ensure efficiency in resource utilization

- Through planning for utilization of the allocated resources (SWOT analysis)
- Implementation plans with timelines
- Continuous monitoring of impact process indicators
- Periodic evaluation objectives if they have been achieved as planned

# REFERENCES

- 1.AAH. (April 2017). *Action Against Hunger Gender Analysis in Busia County*.
- 2.AMPATH. (2018). *PIC4C Baseline Survey 2018*.
- 3.CIDP. (2018). *County Integrated Development Plan (CIDP 2018-2022)*.
- 4.KHIS. (2018). *Kenya Health Information Software (DHIS 2)*.
- 5.GOK, MOH. (2018). *The Kenya National Action Plan 2018-2022*.
- 6.IEBC. *International Electerol Boundaries Commission (IEBC)*.
- 7.IHRIS. (2019). *Integrated Human Resource Information System* .
- 8.KDHS. (2014). *Kenya Demographic and Health Survey*.
- 9.KDHS. (March, 2018). *Kenya Mortality Survey*.
- 10.KHIS. (2019).
- 11.KNBS . (2019). *KNBS CENSUS 2019*.
- 12.KNBS. (2018). *Kenya Household Health Expenditure Survey 2018*.
- 13.LANCENT. (2013). *The Lancet Series Maternal and Child Nutrition*.
- 14.MOH. (2011). *The Kenya National Micronutrient Survey*. Nairobi.
- 15.MOH. (2012). *Maternal Infant and Young Child Nutrition Strategy 2012-2017*. GOK.
- 16.MOH. (2018). *Busia Health Strategic Plan 2018 - 2022*. GOK

# APPENDIXES

## Annex A: Summary table resources needs KRA, Outputs and Activities

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
KRA 01: Maternal, Infant, Young Child (0 - 59 months) Nutrition (MIYCN) scaled up	48,508,700	48,508,700	48,508,700	48,508,700	48,508,700	242,543,500
<b>Output 1: Enhanced capacity of health care workers and CHVs to provide quality MIYCN services</b>	<b>27,754,100</b>	<b>27,754,100</b>	<b>27,754,100</b>	<b>27,754,100</b>	<b>27,754,100</b>	<b>138,770,500</b>
Sensitize key stakeholder and health managers on BFCI	1,341,600	1,341,600	1,341,600	1,341,600	1,341,600	6,708,000
Train health care workers and CHVs on BFCI	4,066,200	4,066,200	4,066,200	4,066,200	4,066,200	20,331,000
Sensitize health managers on BFHI	509,900	509,900	509,900	509,900	509,900	2,549,500
Train health workers on BFHI	476,800	476,800	476,800	476,800	476,800	2,384,000
Conduct BFCI internal and external assessments	18,200,000	18,200,000	18,200,000	18,200,000	18,200,000	91,000,000
Train service providers on MIYCN	168,600	168,600	168,600	168,600	168,600	843,000
Sensitize CHMT and SCHMT on PD-HEARTH	945,000	945,000	945,000	945,000	945,000	4,725,000
Sensitize key community gate keepers of PD-HEARTH	140,000	140,000	140,000	140,000	140,000	700,000
Train health care workers on PD-HEARTH	450,000	450,000	450,000	450,000	450,000	2,250,000
Train CHVs on PD-HEARTH	1,456,000	1,456,000	1,456,000	1,456,000	1,456,000	7,280,000
<b>Output 2: Improved detection of faltering growth for early identification and management of nutrition related conditions</b>	<b>8,194,400</b>	<b>8,194,400</b>	<b>8,194,400</b>	<b>8,194,400</b>	<b>8,194,400</b>	<b>40,972,000</b>
Train health care workers, on growth monitoring and promotion	5,837,800	5,837,800	5,837,800	5,837,800	5,837,800	29,189,000
Train ECD teachers on growth monitoring and promotion	1,294,000	1,294,000	1,294,000	1,294,000	1,294,000	6,470,000
Train CHVs on growth monitoring and promotion	688,800	688,800	688,800	688,800	688,800	3,444,000
Conduct growth monitoring in ECD/community	373,800	373,800	373,800	373,800	373,800	1,869,000
<b>Output 3: Improved MIYCN knowledge and practices among caregivers and the community</b>	<b>5,859,200</b>	<b>5,859,200</b>	<b>5,859,200</b>	<b>5,859,200</b>	<b>5,859,200</b>	<b>29,296,000</b>
Implement PD hearth activities at community levels within community units	1,200,000	1,200,000	1,200,000	1,200,000	1,200,000	6,000,000
Conduct support supervision of PD-HEARTH	1,176,000	1,176,000	1,176,000	1,176,000	1,176,000	5,880,000
Train mother to mother support group on IGA	623,100	623,100	623,100	623,100	623,100	3,115,500
Conduct cooking demonstrations in community	1,008,000	1,008,000	1,008,000	1,008,000	1,008,000	5,040,000
Sensitize the community on dietary diversification	610,500	610,500	610,500	610,500	610,500	3,052,500
Conduct outreaches to the community	1,241,600	1,241,600	1,241,600	1,241,600	1,241,600	6,208,000
<b>Output 4: Enhanced adherence to policies, legislations protecting,</b>	<b>6,701,000</b>	<b>6,701,000</b>	<b>6,701,000</b>	<b>6,701,000</b>	<b>6,701,000</b>	<b>33,505,000</b>

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
promoting and supporting breastfeeding at workplace and general population						
Sensitize health providers on deworming	1,323,000	1,323,000	1,323,000	1,323,000	1,323,000	6,615,000
Sensitize CHMT, SCHMT, health care workers, CHVs and community on BMS act	4,057,500	4,057,500	4,057,500	4,057,500	4,057,500	20,287,500
Sensitize policy makers and government agencies at the boarder like KEBS on BMS Act	525,000	525,000	525,000	525,000	525,000	2,625,000
Sensitize managers of institutions and organizations on establishment of breast-feeding corners at work places	525,000	525,000	525,000	525,000	525,000	2,625,000
Set up breast feeding corners in health facilities	270,500	270,500	270,500	270,500	270,500	1,352,500
<b>KRA 02. Nutrition in older children (5-9 years) and adolescents (10 – 19 years) promoted.</b>	<b>57,403,600</b>	<b>56,220,500</b>	<b>57,604,600</b>	<b>58,959,500</b>	<b>57,394,600</b>	<b>287,582,800</b>
<b>Output 1: Increased knowledge of health care workers and school management on optimal nutrition requirements of older children and adolescents</b>	<b>3,466,200</b>	<b>2,413,200</b>	<b>3,667,200</b>	<b>3,457,200</b>	<b>3,457,200</b>	<b>16,461,000</b>
Train health teachers on nutrition in older children and adolescents	924,000	-	924,000	924,000	924,000	3,696,000
Sensitize stakeholders, school heads, principles and religious teachers on adolescent nutrition	2,422,200	2,413,200	2,623,200	2,413,200	2,413,200	12,285,000
Mentor school health teachers and matrons on nutrition in older children and adolescents	120,000	-	120,000	120,000	120,000	480,000
<b>Output 2: Increased uptake of optimal nutrition among school going children and adolescents</b>	<b>3,479,100</b>	<b>1,759,800</b>	<b>3,479,100</b>	<b>3,454,800</b>	<b>3,479,100</b>	<b>15,651,900</b>
Conduct nutrition education on health diets and physical activity in schools	1,680,000	-	1,680,000	1,680,000	1,680,000	6,720,000
Train adolescent peers	399,000	399,000	399,000	399,000	399,000	1,995,000
Train youth groups on Agri nutrition and WASH	1,360,800	1,360,800	1,360,800	1,360,800	1,360,800	6,804,000
Assess the capacity of youth friendly services to offer nutrition services	39,300	-	39,300	15,000	39,300	132,900
<b>Output 3: Increased uptake of iron and folic acid among adolescent girls through weekly iron folic acid supplementation</b>	<b>5,789,500</b>	<b>7,378,700</b>	<b>5,789,500</b>	<b>7,378,700</b>	<b>5,789,500</b>	<b>32,125,900</b>
Train health teachers on WIFs	-	2,767,200	-	2,767,200	-	5,534,400
Train health care providers on WIFs	1,178,000	-	1,178,000	-	1,178,000	3,534,000
Procure WIFs tablets for supplementation of adolescent girls in schools	2,637,500	2,637,500	2,637,500	2,637,500	2,637,500	13,187,500

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
Supplement adolescent girls in schools with WIFs	564,000	564,000	564,000	564,000	564,000	2,820,000
Monitor and evaluate the implementation of the WIFs programme in schools	1,410,000	1,410,000	1,410,000	1,410,000	1,410,000	7,050,000
<b>KRA 03. Nutrition status of adults (20 – 59 years) and older persons (60 and above) promoted.</b>	<b>10,288,000</b>	<b>11,280,000</b>	<b>9,222,000</b>	<b>10,288,000</b>	<b>10,288,000</b>	<b>51,366,000</b>
<b>Output 1: Increased awareness among the community and health care providers on optimal nutrition for adults and older persons</b>	<b>1,320,000</b>	<b>2,312,000</b>	<b>2,312,000</b>	<b>1,320,000</b>	<b>1,320,000</b>	<b>8,584,000</b>
Conduct Integrated community outreaches to educate the community on nutrition for adults and older persons	1,078,000	1,078,000	1,078,000	1,078,000	1,078,000	5,390,000
Sensitize the community on food diversification	178,000	178,000	178,000	178,000	178,000	890,000
Train CHVs and other community resource persons to promote healthy and sustainable diets at household level	-	992,000	992,000	-	-	1,984,000
Sensitize service providers at home for the aged on geriatric nutrition	64,000	64,000	64,000	64,000	64,000	320,000
<b>Output 2: Enhanced early detection of diet related communicable and non-communicable diseases among adults and older persons</b>	<b>8,071,000</b>	<b>8,071,000</b>	<b>6,013,000</b>	<b>8,071,000</b>	<b>8,071,000</b>	<b>38,297,000</b>
Conduct integrated medical camps at the community level for education and screening of NCDs	2,058,000	2,058,000	kh2,058,000	2,058,000	2,058,000	8,232,000
Sensitize community leaders on regular medical check ups	4,543,000	4,543,000	4,543,000	4,543,000	4,543,000	22,715,000
Train health providers on geriatrics care	1,470,000	1,470,000	1,470,000	1,470,000	1,470,000	7,350,000
<b>Output 3: Improved linkage of vulnerable adults and older persons at the community with social support programs</b>	<b>897,000</b>	<b>897,000</b>	<b>897,000</b>	<b>897,000</b>	<b>897,000</b>	<b>4,485,000</b>
Train community members groups on IGA's	897,000	897,000	897,000	897,000	897,000	4,485,000
<b>KRA 04. Prevention, control and management of Micronutrient Deficiencies in the county.</b>	<b>69,884,310</b>	<b>67,830,810</b>	<b>70,245,310</b>	<b>67,830,810</b>	<b>69,884,310</b>	<b>345,675,550</b>
<b>Output 1: Increased intake of micronutrient rich foods.</b>	<b>53,600,000</b>	<b>51,546,500</b>	<b>53,961,000</b>	<b>51,546,500</b>	<b>53,600,000</b>	<b>264,254,000</b>
Conducting barrier analysis for micronutrient uptake	2,053,500	-	2,053,500	-	2,053,500	6,160,500
Conduct bottleneck assessment	1,210,000	1,210,000	1,571,000	1,210,000	1,210,000	6,411,000

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
for low uptake of micronutrient						
Develop and disseminate key messages to the community on consumption of diversified micronutrient rich foods based on identified barriers	56,000	56,000	56,000	56,000	56,000	280,000
Conduct social behavior change communication activities to promote increased micronutrient uptake	50,280,500	50,280,500	50,280,500	50,280,500	50,280,500	251,402,500
<b>Output 2: Increased intake of micronutrient supplements</b>	<b>735,000</b>	<b>735,000</b>	<b>735,000</b>	<b>735,000</b>	<b>735,000</b>	<b>3,675,000</b>
Conduct campaigns at the community on consumption of micronutrient diversified foods	735,000	735,000	735,000	735,000	735,000	3,675,000
<b>Output 3: Increased coverage of micronutrient supplementation</b>	<b>12,759,310</b>	<b>12,759,310</b>	<b>12,759,310</b>	<b>12,759,310</b>	<b>12,759,310</b>	<b>63,796,550</b>
Train Health workers on VAS and LMIS	1,433,400	1,433,400	1,433,400	1,433,400	1,433,400	7,167,000
Train CHVs on VAS	6,300,000	6,300,000	6,300,000	6,300,000	6,300,000	31,500,000
Conduct outreaches on VAS supplementation	976,510	976,510	976,510	976,510	976,510	4,882,550
Provide IFAS and MNPs supplements to children under-fives	2,016,000	2,016,000	2,016,000	2,016,000	2,016,000	10,080,000
Procure micronutrient supplements (Vitamin A, IFAS, MNPs)	44,400	44,400	44,400	44,400	44,400	222,000
Procure micronutrient powders	234,000	234,000	234,000	234,000	234,000	1,170,000
Advocate for inclusion of supplements in the EMS list	5,000	5,000	5,000	5,000	5,000	25,000
Carry out support supervision of malezi bora activities	1,750,000	1,750,000	1,750,000	1,750,000	1,750,000	8,750,000
<b>Output 4: Increased consumption of fortified foods</b>	<b>2,790,000</b>	<b>2,790,000</b>	<b>2,790,000</b>	<b>2,790,000</b>	<b>2,790,000</b>	<b>13,950,000</b>
Sensitize public health officers on monitoring of fortified foods	234,000	234,000	234,000	234,000	234,000	1,170,000
Conduct campaigns to promote consumption of fortified foods at all levels	168,000	168,000	168,000	168,000	168,000	840,000
Procure iodine testing kits	1,350,000	1,350,000	1,350,000	1,350,000	1,350,000	6,750,000
Conduct salt iodization monitoring activity	705,000	705,000	705,000	705,000	705,000	3,525,000
Conducting trainings on income generating activities	333,000	333,000	333,000	333,000	333,000	1,665,000
<b>KRA 05. Prevention, control, management and rehabilitation of Diet Related Non-Communicable Diseases (DRNCDs).</b>	<b>7,887,700</b>	<b>12,802,700</b>	<b>10,007,700</b>	<b>12,802,700</b>	<b>8,207,700</b>	<b>51,708,500</b>
<b>Output 1: Improved knowledge of health care workers on management of NCDs</b>	<b>4,580,500</b>	<b>6,380,500</b>	<b>6,380,500</b>	<b>6,380,500</b>	<b>4,580,500</b>	<b>28,302,500</b>
Disseminate policies and guidelines on nutrition related NCDs	3,118,500	3,118,500	3,118,500	3,118,500	3,118,500	15,592,500
Train health workers on clinical	1,430,000	1,430,000	1,430,000	1,430,000	1,430,000	7,150,000

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
nutrition therapy for NCDs						
Hold performance review meeting with health care workers for nutrition related NCDs	32,000	1,832,000	1,832,000	1,832,000	32,000	5,560,000
Output 2: Increased awareness of the population on prevention, and management of NCDs	3,307,200	6,422,200	3,627,200	6,422,200	3,627,200	23,406,000
Commemorate world diabetes and cancer day	-	-	NO COST		-	-
Conduct CMEs on importance of physical exercises in management on NCDs for clients attending at the facility	-	320,000	320,000	320,000	320,000	1,280,000
Conduct food safety surveillance	672,000	672,000	672,000	672,000	672,000	3,360,000
Hold dialogue meetings to discuss prevention and control of NCDs	120,000	120,000	120,000	120,000	120,000	600,000
Conduct sensitization meetings on nutrition with NCD support groups	168,000	168,000	168,000	168,000	168,000	840,000
Conduct screening sessions at the community OPD for NCDs	2,347,200	2,983,200	2,347,200	2,983,200	2,347,200	13,008,000
Conduct sensitization sessions with CHVs on diet therapy for NCD clients	-	2,159,000	-	2,159,000	-	4,318,000
<b>KRA 06. Strengthened Clinical and Community Nutrition and dietetics</b>	<b>53,874,800</b>	<b>102,081,380</b>	<b>97,889,280</b>	<b>78,627,380</b>	<b>75,295,280</b>	<b>405,768,120</b>
<b>Output 1: Improved competencies, skills and knowledge of nutritionists and dieticians on clinical nutrition</b>	<b>-</b>	<b>1,720,000</b>	<b>1,720,000</b>	<b>720,000</b>	<b>720,000</b>	<b>2,880,000</b>
Train HCW on nutrition care process	-	144,000	144,000	144,000	144,000	576,000
Train nutrition staff on specialised clinical nutrition courses	-	1,000,000	1,000,000	-	-	-
Conduct OJTs at the health facilities	-	576,000	576,000	576,000	576,000	2,304,000
<b>Output 2: Enhanced standards of quality of nutrition and dietetics services for inpatients and general hospital services</b>	<b>8,879,000</b>	<b>21,074,200</b>	<b>18,159,200</b>	<b>7,745,200</b>	<b>5,670,200</b>	<b>61,527,800</b>
Develop individualized standards operating procedures for provision of clinical nutrition and dietetics	-	144,000	144,000	144,000	144,000	576,000
Conduct quality assurance for provision of clinical nutrition in all facilities	1,079,000	1,079,000	1,079,000	1,079,000	1,079,000	5,395,000
Conduct periodic quality assurance reviews meetings with all nutrition in charges from the county sub county hospitals	-	1,247,200	1,247,200	1,247,200	1,247,200	4,988,800
Sensitize the community on the	-	1,984,000	1,984,000	-	-	3,968,000

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
Disseminate in-patient feeding protocol to all managers, procurements officers, health care workers and other relevant stakeholders	-	5,840,000	5,000,000	-	-	10,840,000
Dissemination of clinical nutrition and dietetics tools	1,840,000	1,840,000	1,840,000	1,840,000	1,840,000	9,200,000
Print and distribute clinical nutrition monitoring and reporting tools	5,960,000	8,940,000	6,865,000	3,435,000	1,360,000	26,560,000
<b>Output 3: Improved access to quality nutrition focused HIV services to all clients at facility and community level</b>	-	3,699,550	3,500,200	1,254,550	1,055,200	9,509,500
Train TOTs on HIV nutrition focused therapy	-	199,350	-	199,350	-	398,700
Train HCW on HIV focused nutrition therapies	-	2,445,000	2,445,000	-	-	4,890,000
Scale up nutrition screening service points for HIV	-	1,055,200	1,055,200	1,055,200	1,055,200	4,220,800
<b>Output 4: Improved access to quality nutrition focused TB services to all clients at facility and community level</b>	-	4,499,550	3,500,200	2,054,550	1,055,200	11,109,500
Train TOTs on TB nutrition focused therapy	-	199,350	-	199,350	-	398,700
Train HCW on TB focused nutrition therapies	-	2,445,000	2,445,000	-	-	4,890,000
Scale up nutrition screening service points for TB patients	-	1,055,200	1,055,200	1,055,200	1,055,200	4,220,800
Sensitize CHVs on assessment and referral of clients of HIV/ TB clients	-	800,000	-	800,000	-	1,600,000
<b>Output 5: Improved coverage of IMAM services</b>	-	10,765,000	10,765,000	6,540,000	6,540,000	34,610,000
Training on IMAM	-	6,540,000	6,540,000	6,540,000	6,540,000	26,160,000
Train HCW on IMAM	-	4,225,000	4,225,000	-	-	8,450,000
<b>Output 6: Optimal logistic management of commodities and equipment for clinical nutrition services</b>	44,995,800	60,323,080	60,244,680	60,313,080	60,254,680	286,131,320
Train HCWs on LMIS for IMAM, HIV, TB and clinical nutrition	-	4,045,000	4,045,000	4,045,000	4,045,000	16,180,000
Purchase and distribution of anthropometric equipment	4,846,000	7,369,400	7,291,000	7,359,400	7,301,000	34,166,800
Purchase of nutrition supplement and therapeutic commodities	40,000,000	40,000,000	40,000,000	40,000,000	40,000,000	200,000,000
Procure and distribute nutrition commodities for clinical nutrition management	-	8,758,880	8,758,880	8,758,880	8,758,880	35,035,520
Procure enteral and parenteral nutrition commodities	149,800	149,800	149,800	149,800	149,800	749,000
<b>KRA 07. Scaled up/ Strengthened nutrition in</b>	<b>54,040,950</b>	<b>56,354,950</b>	<b>53,971,700</b>	<b>53,971,700</b>	<b>53,971,700</b>	<b>272,311,000</b>

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
<b>Agriculture, WASH, education department and social protection.</b>						
<b>Output 1: Nutrition integrated in education</b>	<b>6,177,700</b>	<b>7,817,200</b>	<b>6,177,700</b>	<b>6,177,700</b>	<b>6,177,700</b>	<b>32,528,000</b>
Sensitize BOM on optimal nutrition for school going children including school meals guidelines	3,354,200	3,354,200	3,354,200	3,354,200	3,354,200	16,771,000
Train teachers in learning institutions and ECDE centres on school meals guidelines	-	1,546,000	-	-	-	1,546,000
Train teachers on optimal nutrition for school going children	286,000	286,000	286,000	286,000	286,000	1,430,000
Collaborate with teachers to include nutrition component in 4K clubs	676,500	676,500	676,500	676,500	676,500	3,382,500
Collaborate with agriculture and education to promote establishment of integrated demonstration gardens in schools	482,000	492,000	482,000	482,000	482,000	2,420,000
Sensitize teachers in ECDE centres on growth monitoring, vit A supplementation and deworming	432,000	432,000	432,000	432,000	432,000	2,160,000
Conduct growth monitoring, VIT A supplementation and deworming in ECDE centres in collaboration with teachers	240,000	240,000	240,000	240,000	240,000	1,200,000
Collaborate with education to develop a joint monitoring tool for nutrition activities in schools	7,000	90,500	7,000	7,000	7,000	118,500
Carry out joint nutrition monitoring activities in schools and ECDE Centres	700,000	700,000	700,000	700,000	700,000	3,500,000
<b>Output 2 : Nutrition integrated in Agriculture</b>	<b>18,301,050</b>	<b>18,301,050</b>	<b>18,261,800</b>	<b>18,261,800</b>	<b>18,261,800</b>	<b>91,387,500</b>
Collaborate with agriculture extension staff to promote consumption of diversified foods through nutrition education and cooking demonstrations	2,520,000	2,520,000	2,520,000	2,520,000	2,520,000	12,600,000
Train extension staff and the community members on climate smart agriculture technologies in line with nutrition	548,500	548,500	548,500	548,500	548,500	2,742,500
Training on climate smart	8,688,100	8,688,100	8,688,100	8,688,100	8,688,100	43,440,500
Train Agriculture extension staff on key nutrition messages for agriculture	679,500	679,500	679,500	679,500	679,500	3,397,500
Set up Demonstration gardens at selected health facility levels	700,000	700,000	700,000	700,000	700,000	3,500,000
Establish demonstration gardens	1,640,000	1,640,000	1,640,000	1,640,000	1,640,000	8,200,000
Develop a joint monitoring tool for Agri-nutrition	141,850	141,850	102,600	102,600	102,600	591,500
carry out impact assessment on nutrition in agricultural interventions	951,600	951,600	951,600	951,600	951,600	4,758,000
Train the community on post-	178,500	178,500	178,500	178,500	178,500	892,500

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
harvest management						
Train the community on preparation and utilization of locally available foods	178,500	178,500	178,500	178,500	178,500	892,500
Train the community on value addition	178,500	178,500	178,500	178,500	178,500	892,500
Train the extension officers on preparation and utilization of locally available foods	370,000	370,000	370,000	370,000	370,000	1,850,000
Train the farmers on setting up of household kitchen gardens	1,526,000	1,526,000	1,526,000	1,526,000	1,526,000	7,630,000
<b>Output 3: Nutrition integrated in WASH</b>	<b>26,282,400</b>	<b>26,346,900</b>	<b>26,282,400</b>	<b>26,282,400</b>	<b>26,282,400</b>	<b>131,476,500</b>
Train health care workers on essential Hygiene Actions (household water treatment methods, food safety and hygiene, proper storage of water, environmental hygiene, hand washing at critical times and sanitation)	255,500	255,500	255,500	255,500	255,500	1,277,500
Train CHVs on essential hygiene	8,242,500	8,242,500	8,242,500	8,242,500	8,242,500	41,212,500
Train WUA on essential hygiene and household water treatment	7,623,000	7,623,000	7,623,000	7,623,000	7,623,000	38,115,000
Conduct advocacy meeting targeting health management on allocation of resources for integrated nutrition WASH activities	100,000	164,500	100,000	100,000	100,000	564,500
Trigger the schools, and community to integrate nutrition in WASH activities through SLTS and Sanitation marketing	7,304,500	7,304,500	7,304,500	7,304,500	7,304,500	36,522,500
Document, report and share nutrition WASH best practices	2,536,000	2,536,000	2,536,000	2,536,000	2,536,000	12,680,000
Field survey to establish the current situation of rainfall water storage	143,200	143,200	143,200	143,200	143,200	716,000
Carry out joint support supervision for nutrition WASH activities	77,700	77,700	77,700	77,700	77,700	388,500
<b>Output 4: Nutrition integrated in social protection</b>	<b>3,279,800</b>	<b>3,889,800</b>	<b>3,249,800</b>	<b>3,249,800</b>	<b>3,249,800</b>	<b>16,919,000</b>
Collaborate with the Social Protection department to link the older persons, persons living with disabilities and OVCs to social protection programmes (Inua Jamii)	1,919,400	1,919,400	1,919,400	1,919,400	1,919,400	9,597,000
Consolidate key nutrition messages	5,000	15,000	5,000	5,000	5,000	35,000
Document and share best practices	-	-	No Cost		-	-
Conduct joint monitoring and evaluation visits	1,282,900	1,282,900	1,282,900	1,282,900	1,282,900	6,414,500
Strengthen collaboration and coordination of nutrition in Social Protection	-	-	No Cost		-	-
Train social protection and	-	164,000	-	-	-	164,000

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
nutrition staff on the monitoring tool						
Train staffs in the homes of the elderly, children homes and special schools on nutrition in the life cycle	72,500	151,500	42,500	42,500	42,500	351,500
Conduct joint assessments of institutions for older persons, persons living with disabilities and OVCs	-	357,000	-	-	-	357,000
<b>KRA 08. Strengthened Nutrition Information Systems Research Learning and Innovations.</b>	<b>30,770,413</b>	<b>40,833,213</b>	<b>44,323,323</b>	<b>36,166,213</b>	<b>44,323,323</b>	<b>196,416,485</b>
<b>Output 1: Strengthened coordination for tracking progress of CNAP implementation</b>	<b>3,993,000</b>	<b>5,493,000</b>	<b>7,293,000</b>	<b>5,493,000</b>	<b>7,293,000</b>	<b>29,565,000</b>
Hold Quarterly multi-sectoral nutrition collaboration TWG meetings at county level for tracking progress of nutrition activity implementation	670,000	670,000	670,000	670,000	670,000	3,350,000
Hold AWP development meetings	495,000	495,000	495,000	495,000	495,000	2,475,000
Conduct multisectoral/departmental data review meetings	770,000	770,000	770,000	770,000	770,000	3,850,000
Conduct mid and end term review for CNAP implementation	-	-	1,800,000	-	1,800,000	3,600,000
Conduct mapping for nutrition activities	558,000	558,000	558,000	558,000	558,000	2,790,000
Implementation of the nutrition specific	1,500,000	3,000,000	3,000,000	3,000,000	3,000,000	13,500,000
<b>Output 2: Strengthened use of evidence-based data for nutrition programming</b>	<b>8,818,013</b>	<b>15,672,413</b>	<b>18,946,523</b>	<b>12,589,413</b>	<b>18,946,523</b>	<b>74,972,885</b>
Train health care workers on data quality management	392,840	785,680	785,680	785,680	785,680	3,535,560
Train health care workers on KHIS and other departmental reporting systems	3,012,000	3,012,000	3,012,000	3,012,000	3,012,000	15,060,000
Conduct KAPS Survey	-	-	9,629,370	-	9,629,370	19,258,740
Conduct SMART survey	5,412,173	7,023,733	5,518,473	5,745,733	5,518,473	29,218,585
Conduct nutrition capacity assessment	-	1,805,000	-	-	-	1,805,000
Conduct research on nutrition therapy on NCDs	1,000	3,046,000	1,000	3,046,000	1,000	6,095,000
<b>Output 3: Enhanced information sharing on nutrition and dietetics</b>	<b>2,085,000</b>	<b>3,669,000</b>	<b>2,085,000</b>	<b>2,085,000</b>	<b>2,085,000</b>	<b>12,009,000</b>
Establish portal for nutrition data anchored in the County website	-	100,000	-	-	-	100,000
Develop a website for nutrition	1,815,000	1,901,000	1,815,000	1,815,000	1,815,000	9,161,000
Produce biannual nutrition newsletter	270,000	1,668,000	270,000	270,000	270,000	2,748,000
<b>Output 3: Enhanced monitoring</b>	<b>15,874,400</b>	<b>15,998,800</b>	<b>15,998,800</b>	<b>15,998,800</b>	<b>15,998,800</b>	<b>79,869,600</b>

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
of implementation of the CNAP						
Carry out support supervision during international and national days e.g. world breastfeeding and malezi bora week	8,750,000	8,750,000	8,750,000	8,750,000	8,750,000	43,750,000
Conduct support supervision	7,000,000	7,000,000	7,000,000	7,000,000	7,000,000	35,000,000
Avail nutrition data collection and reporting tools	124,400	248,800	248,800	248,800	248,800	1,119,600
KRA 09. Strengthened departmental and multi-departmental nutrition governance including coordination and legal/regulatory framework	18,124,000	19,069,000	18,124,000	18,124,000	18,124,000	91,565,000
Output 1: Efficient and effective nutrition governance, coordination and legal frameworks in place.	18,124,000	19,069,000	18,124,000	18,124,000	18,124,000	91,565,000
Convene multisectoral meetings on nutrition	284,000	284,000	284,000	284,000	284,000	1,420,000
Carry out stakeholder forums on nutrition	120,000	120,000	120,000	120,000	120,000	600,000
Incorporate WASH, agriculture, education and social protection focal person in CNTF	147,000	147,000	147,000	147,000	147,000	735,000
Hold CNTF and SCNTF	2,159,000	2,159,000	2,159,000	2,159,000	2,159,000	10,795,000
Conduct dissemination meeting to county, sub county SCHMT and community on prioritization of nutrition in planning	882,000	1,827,000	882,000	882,000	882,000	5,355,000
Disseminate policies, strategies and guidelines to departments,	420,000	420,000	420,000	420,000	420,000	2,100,000
Conduct mentorship and supportive supervision	14,112,000	14,112,000	14,112,000	14,112,000	14,112,000	70,560,000
KRA 10. Strengthened Advocacy communication and social mobilization (ACSM).	45,359,000	48,451,200	46,738,000	45,134,000	45,134,000	230,816,200
Output 1: Advocacy communication and social mobilization for nutrition conducted	45,359,000	48,451,200	46,738,000	45,134,000	45,134,000	230,816,200
Develop county specific communication strategy for nutrition	-	2,372,200	-	-	-	2,372,200
Conduct high level advocacy meeting for budgetary allocation to nutrition	125,000	125,000	125,000	125,000	125,000	625,000
Hold targeted fund advocacy meeting with various County Assembly committee members (health, agriculture, education, water)	4,200,000	4,200,000	4,200,000	4,200,000	4,200,000	21,000,000
Conduct high level meeting with key county decision makers to	310,000	310,000	310,000	310,000	310,000	1,550,000

Activities cost per Key Result Areas	2018/19	2019/20	2020/21	2021/22	2022/23	Total
advocate for recruitment of nutrition staff						
Conduct radio talk shows	2,688,000	2,688,000	2,688,000	2,688,000	2,688,000	13,440,000
Hold community dialogue/action days.	22,080,000	22,080,000	22,080,000	22,080,000	22,080,000	110,400,000
Conduct Malezi bora activities to promote MCHN	5,907,800	5,907,800	7,336,800	5,907,800	5,907,800	30,968,000
Mark nutrition health days	2,540,000	2,540,000	2,540,000	2,540,000	2,540,000	12,700,000
Train health care workers and CHVs on SBCC	5,033,200	5,453,200	5,033,200	5,033,200	5,033,200	25,586,000
Print and distribute nutrition specific IEC materials	1,000,000	1,000,000	1,000,000	1,000,000	1,000,000	5,000,000
Produce IEC materials	1,175,000	1,175,000	825,000	650,000	650,000	4,475,000
Resource mobilize from county government and partners.	300,000	600,000	600,000	600,000	600,000	2,700,000
<b>Total</b>	<b>396,141,473</b>	<b>462,432,453</b>	<b>455,634,613</b>	<b>430,413,003</b>	<b>431,131,613</b>	<b>2,175,753,155</b>

# LIST OF KEY CONTRIBUTORS

	NAME	DESIGNATION	ORGANIZATION
1.	DR ISAAC OMERI	CO HEALTH & SANITATION	BUSIA COUNTY
2.	DR MELSA LUTOMIA	COUNTY DIRECTOR HEALTH - PPS	BUSIA COUNTY
3.	DR JANEROSE AMBUCHI	COUNTY DIRECTOR HEALTH - CRS	BUSIA COUNTY
4.	SCHOLASTIC NABADE	COUNTY NUTRITION COORDINATOR	BUSIA COUNTY
5.	VINCENT KWENA	DEPUTY - CNC	BUSIA COUNTY
6.	JAMES KUYA OKATA	CHRIO	BUSIA COUNTY
7.	PHELGONA OTIENO	DCCNO	BUSIA COUNTY
8.	NELSON ANDANJE	CHPO	BUSIA COUNTY
9.	ANJIMBI MARTIN	NUTRITIONIST	NHPplus
10.	CORAZON AWUORI	M&E	NHPplus
11.	LANG'AT K. ELIJAH	CCSD	BUSIA COUNTY
12.	CAROLINE CHEBET	PROJECT OFFICER	SETH
13.	VALARY CHEPLETING	NUTRITIONIST	BUSIA COUNTY
14.	CHARLES MALOBA	SCWO	BUSIA COUNTY
15.	MAURICE OLUOCH	FO	BUSIA COUNTY
16.	JULIET NDUTA	CPC	NUTRITION INTERNATIONAL
17.	RACHAEL OTSIENO	D.ECDE	BUSIA COUNTY
18.	JACQUELINE O. ONGESO	SCAO	BUSIA COUNTY
19.	KONA PAULINE	LPO	BUSIA COUNTY
20.	MARYLINE OBENGA	NTO	NHP plus
21.	TITO KWENA	M&E	BUSIA COUNTY
22.	FAIZA BARASA	M&E	BUSIA COUNTY
23.	GLADYS JEPKEMOI	D.N.M	AMPATH
24.	WILLIAM N.MAKORI	CDE	BUSIA COUNTY
25.	TABITHA APONDI	P.H NUTRITIONIST	BUSIA COUNTY
26.	DORAH MUTONYI	CCO	BUSIA COUNTY
27.	GILBERT MALALA	SPHO	BUSIA COUNTY





