Research Paper 108

September 2018

AN EVALUATION OF THE LEVEL OF INTEGRATION AND ALIGNMENT OF THE MALABO COMMITMENTS, AFRICA'S AGENDA 2063 AND THE SDGS IN 10 NATIONAL AGRICULTURE AND FOOD SECURITY INVESTMENT PLANS

By

Sheryl L Hendriks, Nosipho Mabuza, Kevin R Hendriks, Nic JJ Olivier, Moraka N Makhura, Elizabeth Mkandawire, Ntombizethu Mkhwanazi, Leonard Mkusa and Nokuthula Vilakazi











Food Security Policy Research Papers

This *Research Paper* series is designed to promptly disseminate research and policy analytical outputs generated by the USAID funded Feed the Future Innovation Lab for Food Security Policy (FSP) and its Associate Awards. The FSP project is managed by the Food Security Group (FSG) of the Department of Agricultural, Food, and Resource Economics (AFRE) at Michigan State University (MSU), and implemented in partnership with the International Food Policy Research Institute (IFPRI) and the University of Pretoria (UP). Together, the MSU-IFPRI-UP consortium works with governments, researchers and private sector stakeholders in Feed the Future focus countries in Africa and Asia to increase agricultural productivity, improve dietary diversity and build greater resilience to challenges that affect livelihoods, such as climate change.

The papers are aimed at researchers, policy makers, donor agencies, educators, and international development practitioners. Selected papers will be translated into French, Portuguese, or other languages.

Copies of all FSP Research Papers and Policy Briefs are freely downloadable in pdf format from the following Web site: <u>http://foodsecuritypolicy.msu.edu/publications/research_papers</u>

Copies of all FSP papers and briefs are also submitted to the USAID Development Experience Clearing House (DEC) at: <u>http://dec.usaid.gov/</u>

AUTHORS

Sheryl L Hendriks is Professor of Food Security in the Department of Agricultural Economics, Extension and Rural Development and Director of the Institute for Food, Nutrition and Well-being at the University of Pretoria, South Africa.

Nosipho Mabuza is Research Assistant with the Institute for Food, Nutrition and Well-being and a PhD candidate in the Department of Agricultural Economics, Extension and Rural Development at the University of Pretoria, South Africa.

Kevin R Hendriks is BSc Actuarial and Financial Mathematics student in the Department of Actuarial and Financial Mathematics at the University of Pretoria, South Africa.

Nic JJ Olivier is Senior Consultant and Researcher with the Institute for Food, Nutrition and Well-being, and Prof Extraordinary at the Faculty of Law, North West University, South Africa.

Moraka N Makhura is Senior Lecturer in the Department of Agricultural Economics, Extension and Rural Development at the University of Pretoria, South Africa.

Elizabeth Mkandawire is Research Assistant with the Institute for Food, Nutrition and Well-being and a PhD candidate in the Department of Agricultural Economics, Extension and Rural Development at the University of Pretoria, South Africa.

Ntombizethu Mkhwanazi is Research Assistant with the Institute for Food, Nutrition and Well-being and a Masters candidate in the Department of Agricultural Economics, Extension and Rural Development at the University of Pretoria, South Africa.

Leonard Mkusa is Research Assistant with the Institute for Food, Nutrition and Well-being and a Masters candidate in the Department of Agricultural Economics, Extension and Rural Development at the University of Pretoria, South Africa.

Nokuthula Vilakazi is Coordinator of the Early Career Fellowship Programme, Future Africa at the University of Pretoria, South Africa.

Authors' Acknowledgment:

This research was made possible by the generous support of the American people through the United States Agency for International Development (USAID) through funding to the Feed the Future Innovation Lab for Food Security Policy. The contents are the responsibility of the authors and do not necessarily reflect the views of USAID, the United States Government or the University of Pretoria.

The research team is grateful for the opportunities afforded us by the International Food Policy Research Institute and ReSKASS to participate in the NAIP Task Team activities and the 2017 Saly Portudal Workshop as well as for facilitating access to the 10 NAIPs. The team also thanks Patricia Johannes of MSU for editing and formatting assistance.

This study was made possible by the generous support of the American people through the United States Agency for International Development (USAID) under the Feed the Future initiative. The contents are the responsibility of the study authors and do not necessarily reflect the views of USAID or the United States Government.

Copyright © 2018, Michigan State University and the University of Pretoria All rights reserved. This material may be reproduced for personal and not-for-profit use without permission from but with acknowledgment to MSU and University of Pretoria.

Published by the University of Pretoria and the Department of Agricultural, Food, and Resource Economics, Michigan State University, Justin S. Morrill Hall of Agriculture, 446 West Circle Dr., Room 202, East Lansing, Michigan 48824, USA

EXECUTIVE SUMMARY

The Sustainable Development Goals (SDGs) have introduced greater integration of development objectives across traditional sectors. This integration is also reflected in Africa's Agenda 2063 vision for development. Africa's agricultural and food security initiatives through the 2003 Comprehensive African Agricultural Development Programme (CAADP) seeks to achieve the goals of Agenda 2063 and contribute to the achievement of the SDGs. This commitment is set out in the 2014 Malabo Declaration on Accelerated Agricultural Growth and Transformation for Shared Prosperity and Improved Livelihoods. The African Union recently (2017) established a Biennial Review (BR) mechanism to support the implementation of the Malabo Declaration and hold countries accountable for making progress on the commitments. Currently, many African countries are revising their first five-year CAADP implementation plans and drafting their second five-year National Agriculture and Food Security Investment Plans (or NAIP IIs) in line with the Malabo commitments.

This paper set out to assess ten NAIP IIs from the perspective of the indicator sets contained in the NAIPs against the BR, the First 10-year Implementation Plan of the African Union's Agenda 2063 (2014 to 2023) and the SDGs. The research was conducted in three steps.

- i. An assessment of the NAIP monitoring and evaluation frameworks of ten available NAIPs to determine the alignment between:
 - a. Country NAIPs and the BR indicators,
 - b. Country NAIPs and Agenda 2063's First 10-year Implementation Plan (2014-2023) indicators,
 - c. Country NAIPs and the SDG indicators with a specific focus on food security and nutrition elements,
- ii. The identification of novel and innovative practices and indicators and establish where there are gaps that could be improved; and
- iii. Documenting the insights gained from the analysis and drafting of suggestions to improve the design of monitoring and evaluation frameworks in relation to food security and nutrition components of development programmes across the world.

We find that the NAIP monitoring and evaluation frameworks were generally compliant with the SDG indicators that were directly related to agriculture and food security. However, they do not exploit the opportunities to align in the areas of the SDGs that address some of the core aspirations of the CAADP agenda – seeking to advance agricultural transformation to reduce poverty, inequality and unemployment. Furthermore, a misalignment exists between the monitoring and evaluation frameworks of the NAIPs, the indicators of the BR and the first ten-year implementation plans for Agenda 2063. At a minimum, alignment of the NAIP indicators with the BR could provide more comprehensive coverage of indicators that generally overlap with both Agenda 2030 and the First 10-year Implementation Plan (2014 – 2023) of Agenda 2063. However, the BR could be strengthened from closer alignment with the SDGs and in some areas, adopting the broader specifications in the SDGs could lend more direction to the BR indicators and the reduction in the rate of unemployment among vulnerable groups (including youth). In addition, a significant number of indicators were included in the NAIPs that were not in the BR and could be considered in improving the BR indicator set.

Some countries adopted a more progressive approach to designing their monitoring and evaluation frameworks, resulting in a higher proportion of indicators aligned with the three indicator sets. The lack of appreciation of the full scope of food security (beyond production) led to an imbalanced focus on

production by some countries. Malawi and Liberia responded well to interventions by the team and improved their indicator set.

As is evident from this analysis, country-level planning does not seem to take into account the international and African transversal sectoral frameworks in the drafting of policies, legislation, strategies and action plans. An insufficient number of indicators focussed on the impact indicators of the CAADP Results Framework, namely wealth creation; food security and nutrition; economic opportunities, poverty alleviation and shared prosperity; and resilience and sustainability. Although the second highest performance area coverage was in resilience to climate change, the focus in the BR on climate change meant the NAIPs neglected other elements of resilience related to food security, peace and migration. There is room for improvement in the inclusion of more food security and related indicators, shifting the focus to the inclusion of impact indicators.

We recommend a review of the drafting process and the composition of the drafting team to ensure that NAIP II monitoring and evaluation frameworks include a comprehensive, integrated indicator set that is aligned with the BR, Agenda 2063's First 10-year Implementation Plan (2014 – 2023) and the SDGs. Clearer guidance, supported by oversight and the development of enhanced guidance tools and regular updates (such as the NAIP toolkit) are essential to support country teams in their efforts, especially in view of the rapidly changing circumstances and events such as the passing of new agreements that affect the policy context (such as the recently signed African Free Trade Agreement). The findings of the analysis raise the need for considerably more training on the BR, the design of the NAIP monitoring and evaluation and the alignment of these with Agenda 2063 and the SDGs to ensure alignment and compliance, as well as improve the quality of reporting across the transversal development space.

Mid-term reviews of the NAIPs and their monitoring and evaluation frameworks could provide opportunities for updating and strengthening the frameworks and aligning these more closely with the First 10-year Implementation Plan (2014 - 2023) of Agenda 2063 and the SDGs. Although we have not analysed the alignment of the NAIP monitoring and evaluation frameworks with the individual countries' long-term national development plans and medium-term (five years) Growth and Development Strategies (GDSs; sometimes referred to as Medium Term Strategic Frameworks (MTSFs), this is an area for further analysis and assessment.

EXECUTIVE SUMMARY	v
LIST OF TABLES	viii
LIST OF FIGURES	viii
1. BACKGROUND AND INTRODUCTION	
2. MOTIVATION AND PURPOSE OF THE STUDY	3
3. THE NECESSITY FOR ALIGNMENT OF MONITORING AND EVALUATION FRAMEWORKS WITH GOVERNMENT COMMITMENTS	7
4. THE CAADP 2014+ THEORY OF CHANGE	8
5. METHODOLOGY FOR REVIEWING THE 10 NAIP INDICATOR SETS AGAINST THE BR INDICATOR SET	9
6. FINDINGS OF THE COMPARISON OF ALL THE NAIP INDICATORS AGAINST T BR INDICATORS	
6.1. BR Performance Theme 1: Commitment to the CAADP Process	16
6.2. BR Performance Theme 2: Investment Finance in Agriculture	17
6.3. BR Performance Theme 3: Ending Hunger	18
6.3.1. Access to Agriculture Inputs and Technologies	
6.3.2. Agricultural Productivity	22
6.3.3. Post-harvest Loss	
6.3.4. Social Protection	23
6.3.5. Food Security and Nutrition	24
6.4. BR Performance Theme 4: Eradicating Poverty through Agriculture	27
6.5. BR Performance Theme 5: Intra-African Trade in Agricultural Commodities and Services	29
6.6. BR Performance Theme 6: Resilience to Climate Variability	30
6.7. BR Performance Theme 7: Mutual Accountability for Actions and Results	31
6.8. Innovations not Captured by the BR Performance Themes but Found in the NAIPs	32
6.9. A Note on Gender	34
7. COUNTRY NAIPS AND AGENDA 2063'S FIRST 10-YEAR IMPLEMENTATION PL (2014 – 2023)	
8. ALIGNMENT OF THE NAIPS, THE BR AND THE SDGS	
9. CONCLUSIONS	41
10. RECOMMENDATIONS	43
REFERENCES	44
APPENDIX A: POTENTIAL FOOD SECURITY AND NUTRITION INDICATORS	40
DRAWN FROM AVAILABLE DATA	
APPENDIX B: SUMMARY OF OUTPUTS	60

CONTENTS

LIST OF TABLES

TABLE

1. List of Naips Evaluated in the Study	
2. Indicator Classifications Added to the Seven BR Performance Themes to Accommodate Inne	
the NAIPS	
3. Proportional Distribution of Categories by Country	
4. Proportional Distribution of Indicators for BR Performance Theme 1	16
5. Findings of the Comparison of the NAIPS with the BR Performance Theme 2	17
6. Findings of the Comparison of NAIPS and BR Performance Theme 3.1	
7. Findings of the Comparison of the NAIPS and the BR Performance Theme 3.2	
8. Findings of the Comparison of the NAIPS and the BR Performance Theme 3.3	
9. Findings of the Comparison of the NAIPS and the BR Performance Theme 3.4	
10. Findings of The Comparison of the NAIPS and the BR Performance Theme 3.5	
11. Findings of the Comparison of the NAIPS and the BR Performance Theme 4	
12. Findings of the Comparison of the NAIPA and the BR Performance Theme 5	
13. Findings of the Comparison of the NAIPS and the BR Performance Theme 6	
14. Findings of the Comparison of the NAIPs and the BR Performance Theme 7	
15. Innovative Indicators Found in the NAIPs and not in the BR Performance Themes	
16. Summary of Alignment of the NAIP, BR and Agenda 2063's First 10-year Implementation l	Plan (2014 –
2023) Indicators	
17. Alignment of the NAIP Indicators with the SDGs	

LIST OF FIGURES

FIGURE	PAGE
1. The CAADP Theory of Change Model (Adapted from the CAADP Results Framework	6
2. NAIP Compatibility in Context (From 2010-2015 to 2016-2021 to 2063)	7
3. Measuring Mid-Way Goals in the CAADP Results Framework	
4. Overall Proportional Distribution of BR Performance Themes	14
5. Proportional Distribution of BR Performance Themes by Country	15
6. Proportional Distribution of Sub-Themes within BR Performance Theme 3	19

PAGE

LIST OF ACRONYMS

ASCI	Agricultural Statistical Data and Information
ASWAp	Agricultural Statistical Data and Information Agricultural Sector-Wide Approaches
AU	African Union
AUC	African Union Commission
BMI	Body Mass Index
BR	Biennial Review
BRR	Biennial Review Report
CAADP	Comprehensive African Agriculture Development Programme
CEDEAO	Communaute Economique Des Etats de l'Afrique de l'Ouest
CPA	Cabinet de Planification Agricole
ECOWAS	Economic Community of West African States
FAO	Food and Agriculture Organization
FIES	Food Insecurity Experience Scale
FMARD	Federal Ministry of Agriculture and Rural Development
GDP	Gross Domestic Product
GDSs	Growth and Development Strategies
GM	Government of Malawi
LASIP	Liberia Agricultural Sector Investment Programme
MA	Ministère del'Agriculture
MAH	Ministère de l'Agriculture et de l'Hydraulique
MARD	Ministère de L Agriculture et du Developpement Rural
MAEH	Ministère de L'Agriculture, de L'Elevage et de L'Hydraulique
MAEP	Ministère de l'Agriculture, de l'Elevage et de la Pêche
MDGs	Millennium Development Goals
MEDD	Ministère de l'Environnement et du Développement Durable
MEEF	Ministère de l'Environnement et des Eaux et Forêts
MEF	Ministère de l'Economie et des Finances
MEPA	Ministère de l'Elevage et des Productions Animales
M&E	Monitoring and Evaluation
MTSF	Medium Term Strategic Framework
MPAEM	Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime
MRA	Ministère des Ressources Animales
NAIP	National Agriculture Investment Plan
NEPAD	New Partnership for Africa's Development
NDPs	National Development Plans
ODA	Official Development Assistance
PNIA	Programme National d'Investissement Agricole
PR	Présidence de la République
ReSAKSS	Regional Strategic Analysis and Knowledge support system
RCI	République de Côte d'Ivoire
RIMA	Resilience Index Measurement and Analysis
SDGs	Sustainable Development Goals
SDR	Stratégie de Dévelopement Rural
SE	Secretariat Executif
SLM	Sustainable Land Management
SPCPA	Secretariat Permanent de la Coordination de Lapolitique Sectorielle Agricole
TFI	Trade Facilitation Index
UA	Union Africaine
UN	United Nations
UNECA	United Nations Economic Commission for Africa

UNGA	United Nations General Assembly
USAID	United States Agency for International Development
WASH	Water, Sanitation and Health
WHO	World Health Organization

1. BACKGROUND AND INTRODUCTION

The Sustainable Development Goals (SDGs) have introduced greater integration of development objectives across traditional sectors (United Nations General Assembly (UNGA) 2015). The commitment of the SDGs also brings a promise of greater accountability on the part of governments and all stakeholders (including beneficiaries of development initiatives) in ensuring congruence in development policies and programmes. This commitment is also reflected in Africa's Agenda 2063 (African Union (AU) 2015a) and the 2014 Malabo Declaration on Accelerated Agricultural Growth and Transformation for Shared Prosperity and Improved Livelihoods (African Union (AU) 2014a). The Malabo Declaration arose from the Common African Position on the SDGs (African Union (AU) 2014b) and renewed the commitment of the continent and African countries to the 2003 Maputo Declaration on Agriculture and Food Security in Africa (African Union (AU) 2003) within the framework of the SDGs, but specifically SDG2. SDG 2 seeks to end hunger, achieve food security and improved nutrition and promote sustainable agriculture (UNGA 2015).

Clear targets and milestones are essential for accountability. Monitoring and evaluation frameworks provide a tool for monitoring progress towards these targets and milestones. Integrated development programmes require a comprehensive set of indicators drawn from data across traditional sectors. The alignment of these indicators with international, regional, national and sectoral objectives offers an opportunity for governments to streamline monitoring and evaluation processes through integrated and transparent information systems that can generate reports for multiple development commitments. Apart from the obvious benefits of policy alignment and congruence between sectoral, national, regional and international commitments, alignment of indicator sets constitutes savings in data collection, information processing, the management of systems and report drafting. There is no place where this is more true than Africa, where the capacity to generate and analyse data and the budgets for these functions are limited. The efficiencies of alignment become a resource-saving imperative as well as a means of ensuring consistency in data submissions across these reporting systems. In the case of missing data, aligning with these systems can drive incentives for the collection of data to benefit multiple systems.

The Malabo Declaration succeeds the Maputo Declaration and its commitments to using agriculture-led growth to eliminate hunger, reduce poverty and food insecurity. The Comprehensive Africa Agricultural Development Programme (CAADP) and its first-generation of national agriculture and food security investment plans (NAIPs) were instruments developed for implementing the Maputo Declaration. The NAIPs were five-year investment strategies to set out a plan of action for the implementation of a set of priority programmes. In over 40 countries, NAIPs were developed post the 2007/8 food price crisis and spanned a five-year period.

For many early adopters of the CAADP, these investment plans spanned the period 2010 – 2015. Much was learnt from this process and significant progress has been made regarding achieving the core elements of Millennium Development Goal 1 - the reduction of extreme poverty and hunger by 2015 (Malabo Montpellier Panel 2017). The Malabo Declaration reiterates the continental commitment to the Maputo principles and attempts to align with the SDGs and Africa's Agenda 2063. Some of the key changes introduced to the CAADP process through the Malabo Declaration were:

- "CAADP continues to focus on the agriculture sector, but now also needs to take account of areas in related sectors that are required for agriculture growth;
- More inter-sectoral cooperation and coordination is necessary and should be fostered through suitable and effective coordination mechanisms;
- The need for inter-sectoral cooperation under CAADP increases the role of central government agencies in CAADP country implementation, in particular, that of Ministries of Finance and Planning, or National Planning Commissions;

- The NAIP remains the key vehicle towards achieving the Malabo Declaration targets, but the NAIP can no longer be regarded as the only vehicle for achieving these targets, depending as it does on other implementation frameworks to deliver;
- The emphasis on implementation, results and impact increased. While the Maputo-CAADP era was about setting up the architecture of the process and its milestones (compact, NAIP, business meeting), the Malabo-CAADP era must now build on that foundation and ensure that it delivers on Malabo targets as well as against the other national development targets" (African Union (AU) and NEPAD undated a) (p5).

To reflect the changes brought on board by the Malabo Declaration, the AU country implementation guidelines have incorporated (i) a perspective beyond agriculture, (ii) an emphasis on implementation, delivery and results and (iii), a renewed look at how to stimulate private investment and private sector growth (African Union (AU) and NEPAD undated a). Based on this guidance, countries that had adopted and implemented the 2003 Maputo have been revising and updating their CAADP NAIPs. The second generation NAIPs will roughly cover the next five-year period of 2016 - 2021.

The AU Assembly held in Malabo, Equatorial Guinea recommitted to the CAADP principles and goals and defined a set of targets and goals. The Malabo Declaration outlines seven commitments that are geared towards fostering agricultural growth and transformation. These include seven key areas or components, namely:

- Performance Theme 1: Commitment to the CAADP process
- Performance Theme 2: Investment finance in agriculture
- Performance Theme 3: Ending hunger
- Performance Theme 4: Eradicating poverty through agriculture
- Performance Theme 5: Intra-African trade in agricultural commodities and services
- Performance Theme 6: Resilience to climate variability
- Performance Theme 7: Mutual accountability.

The Heads of States and Governments agreed to a Biennial Review (BR) to ensure delivery on these commitments. Each alternate year the progress of each country will be measured against the Malabo Declaration commitments. Each government submitted a baseline report in 2017 that set out the status of 43 indicators, grouped into the seven key performance themes. In an unprecedented demonstration of commitment to these international and African goals, the Heads of States and Governments of Africa met in Addis Abba in January 2018 to review the baseline reports (African Union 2018a).

2. MOTIVATION AND PURPOSE OF THE STUDY

The motivation for this study arose from the engagement of the research team with countries in Southern and West Africa that were revising and renewing their NAIPs during 2017. The *Country CAADP Implementation Guide under the Malabo Declaration* (African Union (AU) and NEPAD, undated a) was the initial guidance to countries. Apart from this brief guide, not much guidance was provided to countries on the design of their NAIP monitoring and evaluation framework. The Regional Strategic Analysis and Knowledge Support System (ReSAKSS) NAIP Task Force stepped in during 2017 to develop a toolkit (African Union (AU) 2018b) and trained experts to support country teams in reviewing and revising their NAIPs. Parallel to this process, the Technical Guidelines for the BR (AU 2017) were drafted and country representatives trained in the estimation of the indicators during 2017.

The research team members' engagement with country teams in October 2017, just after the submission of the BRs, revealed that the preparation of the monitoring and evaluation frameworks of the NAIPs had not been directly linked to process of developing the first BRs. Country teams participating in a meeting of the ECOWAS (Economic Community of West African States) countries in Saly Portudal, Senegal in October 2017 realised there was enormous value in aligning the monitoring and evaluation frameworks of the NAIPs with the BR indicators. Many teams resolved at the meeting to put effort into doing so in future iterations of the draft NAIP IIs.

The research team was also curious to investigate if the use of the BR framework as a foundation for the monitoring and evaluation frameworks of the NAIPs could improve the quality of the plans themselves. As the BR stretches beyond traditional output and outcome measurement to impact assessment measures. Including the BR indicators, could improve the overall design of programmes and support impact assessment. The research team was particularly interested in determining if the inclusion of food security and nutrition as an impact measure of the BR was transferred to the design of the NAIPs through the inclusion of these indicators in the monitoring and evaluation frameworks present in the NAIP IIs.

Moreover, considerable refinement of the conceptual framework for food security has occurred since the initiation of the CAADP through the Maputo Declaration and the drafting of the NAIPs developed by over 40 African countries between 2009 and 2013. For a review of these changes and trends over time, see Hendriks 2018). The most notable changes to the conceptualisation of food security have included a more recent (2014+) greater awareness of nutrition and the redefining of malnutrition to encompass undernutrition, micronutrient deficiencies as well as overweight and obesity. In response, the revised CAADP Results Framework (AU and NEPAD, undated b) for the second-generation NAIPs includes the World Health Assembly (World Health Organization 2014) targets on nutrition.

The Malabo Declaration commitment sets, amongst others, the following targets to be achieved by 2025:

- At least double productivity (focusing on inputs, irrigation, mechanisation)
- Reduce post-harvest losses at least by half
- Reduce child stunting to less than 10%.

However, a second commitment made at the 2014 Malabo Heads of State Meeting Declaration on Nutrition Security for Inclusive Economic Growth and Sustainable Development reaffirmed the commitment to end hunger by 2025. The commitment seeks to end child stunting (to below 10%) and reduce child underweight to 5% by 2025 (focusing on the first 1000 days of a child's life). The Heads of State and Governments committed to making this commitment a high-level objective in national development plans and strategies and to establish long-term targets that give all children an equal chance for success, by eliminating the additional barriers imposed by child undernutrition (African Union (AU) 2018a).

For this reason, food security and nutrition are impact-level indicators of achievement of the Malabo efforts (see Figure 1), as well as indicators of progress towards specific actions aimed at reducing hunger, food insecurity and malnutrition. The core food security and nutrition indicators contained in the post-Malabo CAADP Results Framework (AU and NEPAD undated b) overlap with indicators in other components of the framework. These include:

- Access to agricultural inputs and technologies
- Agricultural productivity (see section 2b)
- Post-harvest losses (see section 1b)
- Social protection (budget lines (%) on social protection as a percentage of the total resource requirements for coverage of the vulnerable social groups)
- Food security and nutrition, including:
 - o Prevalence of stunting (% of children under five years old who are short for their age)
 - Proportion of underweight children (% of children under five years old who are of low weight for their age)
 - o Prevalence of wasting (% of children under five years old who are of low weight for their height)
 - o The proportion of the population that is undernourished (% of the country's population)
 - o The growth rate of the proportion of Minimum Dietary Diversity for Women
 - o Proportion of children 6-23 months old who meet the Minimum Acceptable Diet.

The NAIP toolkit (African Union (AU) 2018b) offers other complementary metrics that could also be considered by NAIP drafting teams in designing the monitoring and evaluation frameworks as possible impact indicators (see Figure 1):

- For hunger:
 - o Integrated phase classification levels
 - o Numbers of people in need of food assistance
 - o The proportion of the population receiving food assistance
 - Food balance sheet data
 - o Cereal import dependency ratio
- Food insecurity:
 - o Food Insecurity Experience Scale (FIES) this is an SDG2 indicator
 - Women and children's body mass index (BMI)
 - o Agricultural production diversity
 - The contribution of non-staple foods to calorie production, both in amount and monetary value
- For nutrition:
 - o Prevalence of anaemia in children under five years of age and women x
 - Rates of zinc, vitamin A and iodine deficiencies in children under two, children under five and adolescent girls.

Biofortification has received widespread acceptance in the African continent. A number of countries have adopted or are persuing biofortification as a strategy to address selected micronutrient deficiencies such as iron, zinc and vitamin A. While the Harvest Plus programme has been a key driver of biofortification, other development agencies and even the private sector are now engaged in biofortification activities at country level. It has therefore become important to track progress on biofortification at the country level as part of the NAIP M&E process (African Union (AU) 2018b).

The following five indicators have been recommended by the AU to track progress on production, consumption and investments concerning biofortification over time:

- The share of [crop] production (quantity) that is biofortified
- The share of dietary energy consumption derived from biofortified crops
- Percent of people consuming biofortified foods
- Percentage of released crop varieties that are biofortified
- Percent of breeding lines that are biofortified (African Union (AU) 2018b).

Given these conceptual and theoretical changes in the understanding of food security and nutrition, we were also interested to see if country teams had embraced these recent developments and included indicators for food security beyond those related only to increasing production and productivity in the agriculture domain. Appendix A contains a list of additional indicators for food security and nutrition drawn for available international databases. These indicators offer additional resources for benchmarking the current context of food security and nutrition, providing resources with comparative and historical trends.

The purpose of this working paper, therefore, was three-fold:

- i. To assess the NAIP monitoring and evaluation frameworks of ten available NAIPs to determine the alignment between:
 - a. Country NAIPs and the BR indicators
 - b. Country NAIPs and Agenda 2063's First 10-year Implementation Plan (2014 2023) indicators
 - c. Country NAIPs and the SDG indicators with a specific focus on food security and nutrition elements.
- ii. To identify novel and innovative practices and indicators and establish where there are gaps that could be improved, and
- iii. To share the insights gained from the analysis and offer suggestions to improve the design of monitoring and evaluation frameworks in relation to food security and nutrition components of development programmes across the world.

The paper begins with an overview of the policy context for food security and nutrition in Africa and the role of agriculture-focused development efforts in addressing the challenges of food security and nutrition within the context of the SDGs (or so-called Agenda 2030). We then go on to: present the outcomes of a detailed analysis of ten available NAIPs to test their alignment with the BR, identify novel and innovative practices and indicators and establish where there are gaps that could be improved. General and specific recommendations regarding food security monitoring and evaluation components are provided for the countries in particular and, more generally, for Africa as a region. We then turn to a discussion of how well aligned the NAIP monitoring and evaluation frameworks are aligned with Agenda 2063 and the SDGs. Finally, we reflect on the insights and make suggestions for improving the BR and give guidance to countries relating to strengthening their NAIP monitoring and evaluation frameworks.

It must be noted that we did not expect perfect alignment of the NAIP monitoring and evaluation frameworks with the BR because the BR Technical Guidelines were developed after some NAIP IIs (for example Niger) had already been launched and while other countries were developing their NAIPs. This analysis does not intend to call out countries for non-compliance, but rather seeks to identify how to improve the NAIP monitoring and evaluation frameworks across the board, as well as providing ideas on how the BR indicators can be improved to better align with Africa's Agenda 2063 and the SDGs.

What is the		Who are the		How will the]	What activities		Outputs ¹]	Outcomes ²]	Impact ³
problem?		target		problem be		are needed to		What is the		What are the wider		What is the
		beneficiaries?		overcome?		bring about		<i>measurable effect</i> of		benefits of this		long-term
						change?		these		action/investment?		change or
								actions/investment?				goal?
Weak		People who are:		Linking		Identification and		Effective and inclusive		Increased agricultural		Wealth creation
agricultural		_		interventions		packaging of a set		policy design and		production and		
growth		Under-		to results that		of investments in		implementation		productivity		Food security
		nourished		inform and		priority areas						and nutrition
Largely agrarian		Poor		guide				Effective and		Increased intra-		
society		Vulnerable		programme		Policy review and		accountable	1	African regional trade		Economic
	А	Unemployed	Д	design and		reform to		institutions	П	and better	Ч	opportunities,
Pervasive	$\left \right\rangle$			track progress		support			\Box	functioning national		poverty
malnutrition,	H		4			investments	4	Strengthened capacity	Լ/	and regional markets	7	alleviation and
poverty,				Create		T		for evidence-based		E 1.11 1	1	shared
inequality and			,	coherence and consistency	1	Institutional reform to		planning, implementation and	'	Expanded local agricultural industry		prosperity
unemployment				among		support		review		and value chain		Resilience and
				multiple results		implementation		ICVICW		development,		sustainability
				=> setting		implementation		Improved		inclusive of women		sustainability
				technical goals				multisectoral		and youth		
				and targets				coordination,		j		
				0				partnerships and		Increased resilience		
				Prioritization				mutual accountability		of livelihoods and		
				and targeting						improved		
				=> actions,				Increased public and		management of risks		
				commodities,				private investment in		on the agricultural		
				and locations				agriculture		sector		
								Increased capacity to		Improved		
								generate, analyse and		management of		
								use data, information,		natural resources for		
								knowledge and		sustainable		
								innovations		agriculture		

Figure 1. The CAADP Theory of Change Model (Adapted from the CAADP Results Framework

Source: AU and NEPAD undated b and Fofana 2017.

¹ CAADP Results Framework Level 3: Strengthening the systematic capacity to deliver results. Note that the term *outputs* for what is sometimes referred to as *intermediate outcomes* in other contexts.

² CAADP Results Framework Level 2: Agricultural transformation and sustained inclusive agricultural growth.

³ CAADP Results Framework Level 1: Agriculture's contribution to economic growth and inclusive development.

3. THE NECESSITY FOR ALIGNMENT OF MONITORING AND EVALUATION FRAMEWORKS WITH GOVERNMENT COMMITMENTS

African governments have committed themselves to numerous binding and non-binding international, continental and regional commitments and obligations. Some of these include the SDGs, Africa's Agenda 2063 and regional development frameworks. National transversal development frameworks (national development plans) set out commitments and targets. These national plans are underpinned by medium-term growth and development strategies (GDSs) or plans (sometimes referred to as medium term strategic frameworks (MTSFs)) that seek to implement the national development plan and ensure progressive achievement of the commitments made at all levels.

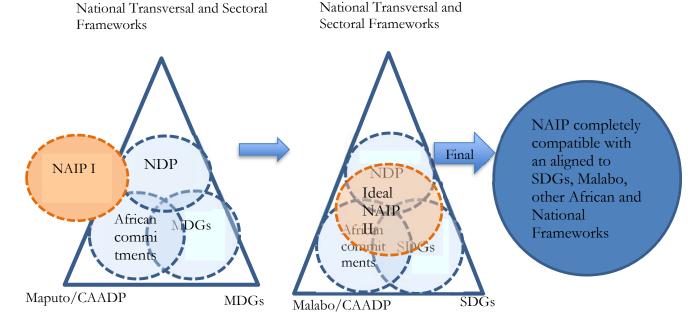
The purpose of the NAIPs is to provide a plan of action to achieve the Malabo commitments through a bundle of interventions aimed at stimulating agricultural growth to reduce poverty and inequality and achieve improved food security and nutrition. NAIPs should transcend sector plans, providing a multi-sectoral and multi-stakeholder initiative within the framework of the national, regional, continental and international development frameworks (see Figure 2).

One of the unique features of the Malabo commitments and the design of the second generation NAIPs (or NAIP IIs) is a far greater alignment of targets and impacts with national transversal development frameworks (represented in Figure 2 as NDPs which include the Constitution, National Development Plans, Medium-term Strategic Frameworks and Sector Plans), global commitments (such as human rights right to be free from hunger, children's rights and multiple others), as well as the SDGs.

This is so that eventually the NAIPs would encapsulate (or be inseparable from) the SDGs, Malabo indicators and national transversal frameworks. Figure 2 represents the shift from NAIP I to greater alignment of the NAIP II to these broader frameworks. Stronger support systems and guidance is needed to assist countries in realising this alignment.

The Innovation Lab for Food Security Policy set out to engage in research and direct support to countries to achieve changes in policies and policy processes.

Figure 2. NAIP Compatibility in Context (From 2010-2015 to 2016-2021 to 2063)



4. THE CAADP 2014+ THEORY OF CHANGE

Monitoring NAIP progress towards the established goals requires a monitoring and evaluation framework that includes indicators at all levels (input, output, outcome and impact). See Figure 3.

Our evaluation of the monitoring and evaluation frameworks of the ten available second-generation NAIPs provided an opportunity to explore how well this theory of change has been internalised and adopted by the country teams drafting the NAIP IIs. The methodology adopted is set out in the next section of the paper.

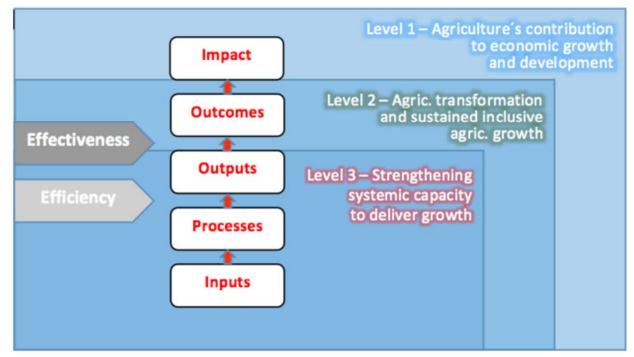


Figure 3. Measuring Mid-Way Goals in the CAADP Results Framework

Source: (African Union (AU) and NEPAD undated a) (p 25).

5. METHODOLOGY FOR REVIEWING THE 10 NAIP INDICATOR SETS AGAINST THE BR INDICATOR SET

The NAIP indicators of the ten counties (the Republics of Benin, Burkina Faso, Cote d'Ivoire, Guinea, Guinea Bissau, Liberia, Malawi, Niger, Nigeria and Togo) were reviewed against the indicator framework for the BR to evaluate the alignment of the NAIP indicators with those of the BR. Not all ten NAIPs were at the same stage of development. Some were first drafts, while others were revised drafts and five were the final adopted versions. Table 1 reports the versions of the NAIPs. The grey cells in Table 1 indicate which versions of the NAIPs were analysed. Five of the countries had finalised their NAIP II, one country had revised the NAIP II, and four had draft NAIP IIs.

The research team members worked in pairs to classify the indicators of each country's NAIP II against the BR framework. The whole team then checked the classifications, problems were identified, categorisation was refined to capture anomalous indicators and a category for novel innovations was established. Pairs then worked to refine the classification, but this time working with the seven BR performance themes rather than per country to ensure consistency, accuracy and replicability. Some new categories were added to the indicator classification to capture innovations by countries that were not captured by the BR. These additional indicators are presented in Table 2. The full set of data can be found in Appendix B.

Next, the BR indicators (AU set out in the Technical Guidelines (AU 2017) were compared with those of the First 10-year Implementation Plan (2014 – 2023) for Agenda 2063 (African Union (AU) 2015b) (see Appendix B). The 200 indicators of Agenda 2063's First 10-year Implementation Plan (2014 – 2023) were examined and indicators that matched the BR indicators were identified. The number of matching indicators per NAIP was estimated per Agenda 2063 goal.

Finally, the food security and nutrition-related indicators were identified from the 17 SDGs (SDG indicators) (UN General Assembly (UNGA) 2018). The BR indicators were all classified against the SDG indicator set (see Appendix B). The number of matching indicators for each NAIP per SDG indicator was estimated.

Table 1. List of Naips Evaluated in the Study

Republic of:	CAADP NAIP I	Draft NAIP II	Revised Draft NAIP II	Final NAIP II
Benin	Agricultural Investment Plan (MAEP and MEF 2010)			National Plan for Agricultural Investments and Food and Nutritional Security (MAEP 2017)
Burkina Faso	National Rural Sector Programme (PNSR) 2011-2015. (MAH, MEDD, and MRA 2012)	Second National Rural Sector Programme (SPCPA 2017)		
Cote d'Ivoire	National Agricultural Investment Programme (PNIA 2010-2015) (RCI 2010) Detailed Investment Plan for Implementation of the Programme National Agricultural Investment (CEDEAO, RCI, and UA 2012)			National Programme Agricultural Investment II (RCI 2017)
Guinea	Agricultural Investment Plan for 2010 - 2015(MA 2010) National Plan for Agricultural and Food Security for 2013 – 2017 (MA 2012)		National Plan for Agricultural and Food and Nutrition Security (MA, MEPA, MPAEM and MEEF 2017)	National Plan for Agricultural and Food and Nutrition Security (MA, MEPA, MPAEM and MEEF 2018).
Guinea Bissau	National Programme Agricultural Investment (MADR and CPA 2013)	National Agricultural Investment Plan (MAEP 2017)		
Liberia	Liberia Agricultural Sector Investment Programme (LASIP) Report (Ministry of Agriculture 2010a)	Liberian Agricultural Sector Investment Plan (MA 2018a)	Liberian Agricultural Sector Investment Plan (MA 2018b)	
Malawi	The Agricultural Sector Wide Approach: Malawi's prioritized and harmonized Agricultural Development Agenda (Ministry		National Agricultural Investment Plan (GM 2017)	National Agricultural Investment Plan (GM 2018).

Republic of:	CAADP NAIP I	Draft NAIP II	Revised Draft NAIP II	Final NAIP II
	of Agricultural and Food			
	Security 2010)			
Niger	Investment Plan PNIA/SDR			Plan of Action 2016-2020 of the
	Niger (SE 2010)			3N Initiative (PR 2016)
Nigeria	National Agriculture Investment	National Agricultural Investment		
	Plan 2011-2014 (FMARD 2010)	Plan 2 (FMARD 2017)		
Togo	National Programme for	National Plan for Agricultural		
	Agricultural Investment and	Investment and Food Nutrition		
	Food Security (MAEP 2010)	Security (MAEH 2017).		

Table 2. Indicator Classifications Added to the Seven BR Performance Themes to Accommodate Innovations in the NAIPS

Indictor relevant to BR performance area 3.1 (productivity):
3.1vii Access to technologies and equipment
Indicators relevant to BR performance area 3.5 (food security and nutrition):
3.5viii Prevalence of anaemia in women of childbearing age (15 to 49 years) (%)
3.5ix Prevalence of anaemia in children (%)
3.5x Strengthening nutrition-specific and nutrition-sensitive actions
3.5xi Reduction in number of people requiring food assistance
3.5xii Number of fortification initiatives
3.5xiii Quantity of biofortified foods produced
3.5xiv Number of nutrition rehabilitation centres
3.5xv Exclusive breastfeeding rate (%)
\mathbf{L}
Indicator relevant to BR performance area 6.2 (resilience to climate change)
6.2i Number of households affected by climate-related shocks
Indicators not directly linked to BR indicators:
8.1 Infrastructure
8.2 Communication and media
8.3 Commercialisation
8.4 Energy
8.5 Beneficiary identification – specifically vulnerable groups
8.6 Diversity
8.7 Impact on the quality of life
8.8 Capacity to implement beyond the extension
8.9 Water, sanitation and health (WASH)
8.10 Recovery of service fees (water base)
8.11 Execution rate of public expenditure
8.12 Conflict reduction rate

6. FINDINGS OF THE COMPARISON OF ALL THE NAIP INDICATORS AGAINST THE BR INDICATORS

The 10 countries included a total of 919 indicators (Table 3). Niger's monitoring and evaluation framework had the highest number of indicators (266). Guinea had the least (31) indicators. Figure 4 depicts the overall distribution of indicators across the seven BR performance themes and the eight new performance themes. The highest number of indicators was found in theme 3 on ending hunger (36%), followed by theme 6 (resilience to climate change with 14% of the total number of indicators) and theme 4 (eradicating poverty through agriculture with 12%) (see Table 3).

Twelve percent of indicators fell into our category for innovative indicators (those not captured by the BR. These are discussed in section 6.9. Figure 5 shows the proportional distribution across the performance themes for each country. A detailed analysis of each performance theme is presented in the sections that follow.

This section of the paper presents the findings of the analysis of the NAIP monitoring and evaluation frameworks against the BR indicators. The findings are presented per BR performance theme and sub-theme for the NAIPs assessed.

	Total		Countries									
BR performance theme	Frequency	Proportion (%)	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo
1. Commitments to CAADP process	67	7	0	7	2	0	11	2	3	27	0	15
2. Investment finance in agriculture	72	8	8	4	13	4	11	2	3	4	9	14
3. Ending hunger	327	36	10	31	22	11	48	24	21	112	15	33
4. Eradicating poverty through agriculture	113	12	12	14	19	9	19	8	7	15	8	2
5. Intra-African trade in agriculture commodities	44	5	6	4	5	3	12	1	7	3	3	0
6. Resilience to climate variability	129	14	3	28	10	2	21	7	3	44	0	11
7. Mutual accountability for actions and results	44	5	2	9	1	2	7	5	2	7	0	9
8. NEW: Innovations not captured by BR indicators	123	13	6	28	4	0	8	2	1	54	0	20
Total	919	100	47	125	76	31	137	51	47	266	35	104

Table 3. Proportional Distribution o	of Categories by Country
--------------------------------------	--------------------------

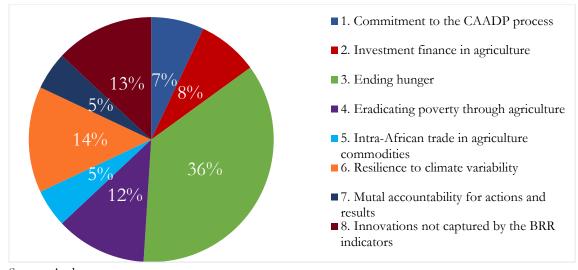


Figure 4. Overall Proportional Distribution of BR Performance Themes

Source: Authors.

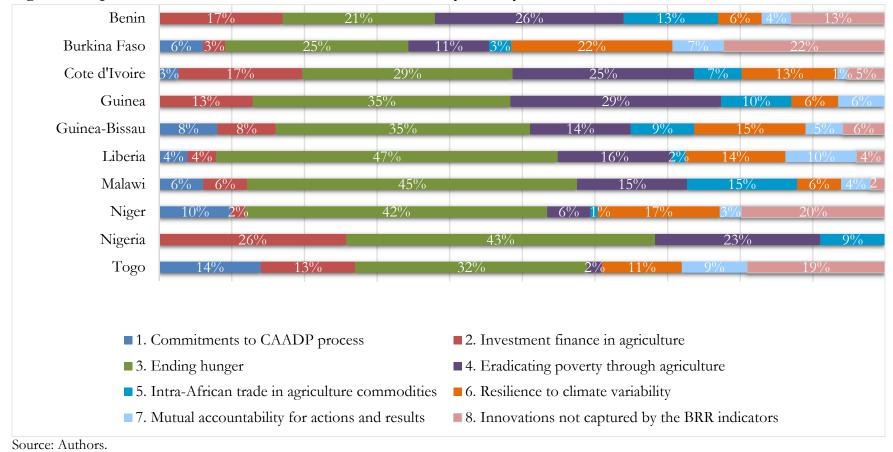


Figure 5. Proportional Distribution of BR Performance Themes by Country

6.1. BR Performance Theme 1: Commitment to the CAADP Process

As indicated above, the purpose of the analysis is not to call out NAIPs that did not perfectly align with the BR indicators. Firstly, the BR guidelines were developed after the completion of some of the NAIPs. Secondly, direct alignment of specific BR elements such as the process indicators related to the CAADP process as a whole (BR performance theme 1) and the preparation of the BR report (performance theme 7) would naturally not be found in the NAIP indicators. For this reason, no indicators were found pertaining to BR indicator 1.1. This was to be expected as the indicator is specific to the BR reporting process (Table 4).

With regards to indicator 1.2, Niger listed the most indicators in this domain (13), including details of coordination and partnerships at all levels of society. Only Niger's NAIP referred to the coordination of emergency and disaster efforts. The three Malawi indicators related to the existence of oversight (sectoral) and technical working groups, as well as the coordination of services at all levels. Malawi and Togo included indicators for sector level oversight of the NAIP, while Guinea-Bissau referred to the existence of an Inter-Ministerial Committee for Oversight. Benin, Guinea and Nigeria did not list any indicators for CAADP-based cooperation, partnerships and alliances.

Burkina Faso, Niger and Togo included indicators for monitoring the integration of nutrition and the NAIP into programmes. Niger included an indicator to monitor the number of sectoral policies incorporating the nutrition security component. This NAIP was very focused on the 3N Initiative: 'Nigeriens Nourishing Nigeriens' with the integration of nutrition actions across sectors.

Only Burkina Faso, Guinea-Bissau, Liberia (one indicator), Niger and Togo listed indicators falling into BR indicator 1.3. Niger and Togo included efforts to monitor the number of policy and programme reform measures implemented. Togo specifically indicated a target for a food security and nutrition policy to be formulated and monitoring the number of policy reforms carried out.

	Cour	Countries										
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total	
	Num	Number of indicators in the NAIP										
1.1 Country CAADP process	0	0	0	0	0	0	0	0	0	0	0	
1.2 CAADP based cooperation, partnership and alliance	0	4	2	0	4	1	3	13	0	7	34	
1.3 CAADP-based policy and Institutional review/setting/support	0	3	0	0	7	1	0	14	0	8	33	
Total	0	7	2	0	11	2	3	27	0	15	67	

Table 4. Proportional Distribution of Indicators for BR Performance Theme 1

6.2. BR Performance Theme 2: Investment Finance in Agriculture

Eight of the ten countries listed the CAADP-aligned indicator of public agriculture expenditure as a share of total public expenditure in their NAIPs (Table 5). Guinea-Bissau further disaggregated this by different priority themes such as expenditure on research, technical capacity, infrastructure development, fisheries sector, etc. Only Togo included indicators on the availability of funding for developing a medium-term expenditure framework and Triennial Plan. Only Cote d'Ivoire included public expenditure on agriculture as a share of agriculture value added.

Burkina Faso and Togo included indicators for Official Development Assistance (ODA) which the other countries ignored. Togo went a step further, listing the funding orientation of each donor. Guinea-Bissau, Liberia, Niger and Togo did not include indicators for private sector investment in agriculture. The other countries did so, but without differentiating between domestic and foreign private sector investment in agriculture.

All the countries except Burkina Faso had at least one indicator for access to finance for smallholders. Benin and Guinea disaggregated the indicator on smallholder access to finance by sex. Benin also disaggregated this by youth. Nigeria's main focus under this performance theme was on agricultural finance to smallholder farmers, which was disaggregated by different financial institutions and by sex. Liberia included indicators for the types as well as the proportion of farmers with access to innovative agro-financing. Cote d'Ivoire's indicators in this theme covered most of the BR performance indicators. Guinea-Bissau had 11 indicators covering only two performance indicators from this performance theme.

	Coun	tries									
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total
	Number of indicators in the NAIP										
2.1i Public agriculture expenditure as share of total public expenditure	3	3	1	1	10	0	0	3	1	5	27
2.1ii Public expenditure as % of agriculture value added	0	0	1	0	0	0	0	0	0	0	1
2.1iii ODA disbursed to agriculture as percentage of commitment (ODA)	0	1	0	0	0	0	0	0	0	3	4
2.2 Domestic private sector investment in agriculture	2	0	4	1	0	0	1	0	1	0	9
2.3 Foreign private sector investment in agriculture	2	0	4	1	0	0	1	0	1	0	9
2.4 Access to finance for smallholders	1	0	3	1	1	2	1	1	6	6	22
Totals	8	4	13	4	11	2	3	4	9	14	72

Table 5. Findings of the Comparison of the NAIPS with the BR Performance Theme 2

For Liberia, indicators for public agriculture expenditure and private sector investments were lacking. As with Liberia, Malawi did not include indicators on public agriculture expenditure in their framework to monitor if the country is upholding the Malabo Declaration recommitment of allocating 10% of public expenditure to the agricultural sector.

6.3. BR Performance Theme 3: Ending Hunger

This performance theme included five sets of indicators: (i) access to agriculture inputs and technologies (BR indicator 3.1); (ii) agricultural productivity (BR indicator 3.2); (iii) post-harvest losses (BR indicators 3.3); (iv) social protection (BR indicator 3.4); and (v) food security (BR indicator 3.5). The five sections are be dealt with sequentially in the following sub-sections.

Access to agricultural inputs and technologies had the highest number of indicators. Figure 6 shows that the NAIPs still predominantly focus investment on agricultural support programmes (indicator 3.1) for primary production. This includes inputs (fertiliser, seeds, irrigation, mechanisation and equipment). Overall, 74% of the indicators in performance theme three focussed on primary production and six percent on post-harvest losses. Food security-orientated indicators represented less than a quarter of the indicators in this sub-theme. While increasing production and productivity is essential for improving food security and achieving some of the commitments in the Malabo Declaration, achieving food security and nutrition goals require complementary programmes beyond the domain of primary production.

This reflects a dire need to develop an appreciation and understanding of the need to shift from outputs and outcome indicators to measuring impact. Malawi seems to have the most balanced indicator framework with regard to the proportions of indicators for production and productivity elements relative to food security and nutrition indicators. For Togo, Burkina Faso, Guinea-Bissau – over 80% of indicators focussed on production and productivity.

Nigeria and Niger had the fewest indicators for this sub-theme respectively. Togo's indicators in this section focussed primarily on access to agricultural inputs and technologies (82%). Nearly half of Guinea's indicators were focussed on food security and nutrition (46%), with social protection contributing just over half (55%) of the total number of indicators. Malawi (29% focus on food security and nutrition) and Liberia's (38%) portfolio of indicators in this section was more balanced between production vs social protection, food security and nutrition. A point to note here is that the research team had extensive input into the draft plans for these two countries, having reviewed the draft versions of the plans before the finalisation of the Malawi NAIP and the revision of the pre-final Liberian NAIP. This earlier version of the Liberian NAIP did not include a monitoring and evaluation framework. This was added post the Saly Portudal meeting in October 2017 and the input of the research team.

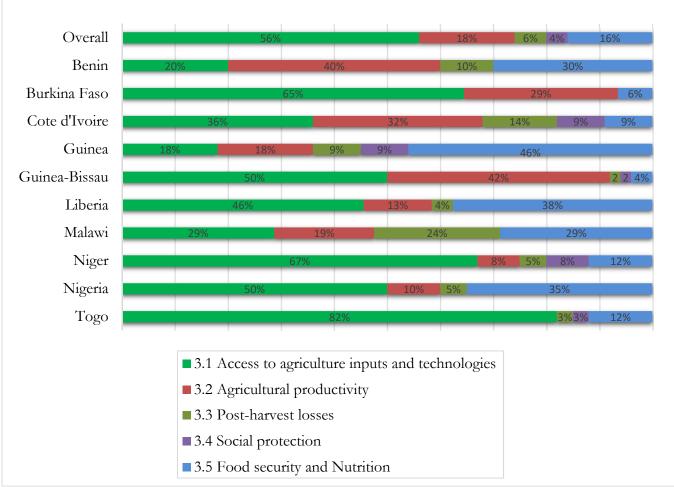


Figure 6. Proportional Distribution of Sub-Themes within BR Performance Theme 3

Source: Authors.

6.3.1. Access to Agriculture Inputs and Technologies

Access to agricultural inputs and technologies had the highest number of indicators compared to the other sub-themes (Table 6). The six performance indicators under this category were expanded to seven in this analysis to cater for the indicators for access to technologies and equipment (3.1vii) which were not included in the BR indicators. The highest number of indicators was found for the supply of quality agriculture inputs, the size of irrigated areas, the proportion of farmers with access to advisory services and the proportion of smallholders with access to technologies and equipment. Guinea-Bissau and Nigeria can be commended for including all the BR indicators related to access to agricultural inputs and technologies with most indicators focusing on measuring quantity of supply of agricultural inputs for both crops and livestock.

Niger had the highest number of indicators in this sub-theme. Although this theme focused on production, Niger's plan commendably focusses strongly on nutrition-sensitive programmes. Liberia had a unique indicator for access to gender-sensitive technologies but did not specify the details of this indicator.

Guinea-Bissau, Malawi, Niger and Nigeria included indicators for fertilizer consumption. Guinea-Bissau is also the only country that disaggregated fertilizer consumption by type (organic compared to synthetic fertilizers).

	Cot	intries									
Performance indicator	Benin	Burkina Faso	5 Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia Liberia	t Malawi	Niger	Nigeria	Togo	Total
3.1i Fertilizer consumption (kilogram of nutrients per hectare of land)	0	0	0	0	3	0	1	4	1	0	9
3.1ii Growth rate of the size of irrigated areas from its value of the year 2000	0	8	1	0	4	0	2	20	3	1	39
3.1iii Growth rate of the ratio of supplied quality agriculture inputs (seed, breed, fingerlings) to total national input requirements for the commodity	0	6	1	0	8	0	1	23	1	4	44
3.1iv Proportion of farmers having access to agricultural advisory services	0	1	1	0	4	4	1	12	1	12	36
3.1v Total agricultural research spending as a share of AgGDP	1	0	0	1	1	2	0	0	3	0	8
3.1vi Proportion of farm households with ownership or secure land rights	0	2	2	0	1	0	1	0	1	5	12
3.1vii Access to technologies and equipment	1	3	3	1	3	5	0	13	0	5	34
Total	2	20	8	2	24	11	6	72	10	27	182

Table 6. Findings of the Comparison of NAIPS and BR Performance Theme 3.1

This constitutes a shift in focus away from the first generation NAIPs that predominantly focussed on fertiliser input subsidies and seems to indicate a more measured approach to the use of fertiliser. The shift away from fertiliser could have been influenced by the lapse of the Abuja Declaration on Fertiliser for the Green Revolution (AUC 2006), which committed countries to increase fertilizer use from 8.0 kilograms to 50.0 kilograms of nutrients per hectare by 2015. The judicious use of fertiliser is important as the indiscriminate application of fertiliser has dire environmental consequences.

Most of the countries (with the exception of Benin, Guinea and Liberia) included indicators on the size of irrigated land and the supply of quality inputs. Niger included 20 indicators for the size of irrigated land, most of which are related to irrigation infrastructure such as boreholes and dams built. This focus on irrigation may well be a response to the lessons learnt from the 1990s famine in Niger that led to the loss of many lives. Benin, Guinea and Liberia did not include indicators for irrigation.

Regarding the growth rate of the supply of quality agricultural inputs (seeds, breeds and fingerlings), Niger again stands out with 23 indicators in this theme. Niger's indicators include the establishment of seed banks, rehabilitated central nurseries, communal nurseries and the number of seed centres established and re-

established. This reflects a strong commitment to distributing and increasing access to improved varieties. Benin, Guinea and Liberia did not include indicators in this theme.

Niger and Togo included 12 indicators each in this performance theme (3.1iv). Except for Benin and Guinea, countries listed indicators for farmers having access to agricultural advisory services. Countries also included indicators reflecting the number of training workshops held and the capacity development of extension officers. Burkina Faso included an indicator for the proportion of vulnerable households receiving production support. Niger specifically mentioned farmer field schools as well as vocational training as a mechanism for capacity building and support. Most other countries' indicators focused on the number of staff and beneficiaries trained. These are output indicators that do not reflect the quality of training and the uptake and application of knowledge.

Togo's indicators focused on family farm capacity building and support. Liberia included an indicator for the ratio of extension officers to farmers. Niger included an indicator of support to family farms and agricultural and agri-food agencies. Sex-disaggregated data is essential for this theme as women's access to extension services is often constrained, but was not included in the NAIP monitoring and evaluation frameworks of any of the 10 country NAIPs.

Benin, Guinea, Guinea-Bissau, Liberia and Nigeria included indicators for agricultural research spending. However, the countries did not specifically include the total agricultural research spending as a share of agriculture gross domestic product (AgGDP) as per the BR.

African governments committed to allocating at least 1% of GDP to Research and Development by 2025 through the 2015 Addis Ababa Action Agenda (United Nations Department of Economic and Social Affairs 2015). The lack of indicators is particularly worrying because the first priority area of the Science, Technology and Innovation Strategy for Africa 2024 (AU 2014c) is 'Eradication of hunger and achieving food security'.

Expenditure on this element is essential to drive agricultural productivity growth and agriculture system transformation. A lack of research and development also affects the quality of agricultural extension services. In light of the impacts of climate change and variability and the emergence of new pests and diseases in Africa (such as fall armyworm), research and development that is specific to the agro-ecological environment and cultural specificities of the country is imperative to reduce risks at all levels. Only Nigeria included an indicator for the allocation of funds to national research bodies.

Burkina Faso, Cote d'Ivoire, Guinea-Bissau, Malawi, Nigeria and Togo included indicators related to the improvement in farm households' land ownership or secured land rights. Togo included some indicators related to ownership, registration and leasing. Guinea-Bissau included an indicator for the existence of a land security policy, indicating that this will be developed. Only Malawi disaggregated the number of farmers with land rights by sex and age. It is important for African countries to disaggregate land rights data by sex as many women are discriminated against when it comes to land ownership and/or control over the use of land.

We found that most countries (except Malawi and Nigeria) included indicators for access to labour-saving technologies in their results framework. Only Cote d'Ivoire included an indicator for the rate of mechanisation. There was no BR category for this indicator (3.1vii). Under the Malabo Declaration, countries have committed to making investments in suitable, reliable, and affordable mechanisation and energy supplies to achieve a doubling of productivity by 2025 (Malabo Montpellier Panel 2018). Currently, Africa is the region with the least mechanised agricultural system in the world (Malabo Montpellier Panel 2018). African farmers have ten times fewer mechanised tools per farm area than farmers in other developing regions, and access has not grown as quickly as in other regions (Malabo Montpellier Panel 2018).

6.3.2. Agricultural Productivity

Agricultural productivity had three BR indicators relating to labour productivity, land productivity and yields of agricultural commodities (Table 7). Most countries placed importance on improving the yields of priority commodities, with 44 out of the 59 indicators falling into this category. Cote d'Ivoire is the only country that included indicators on all three dimensions of agricultural productivity: the yield of main agricultural products, land productivity as well as labour productivity.

Except for Cote d'Ivoire, labour productivity was not considered. Increasing agricultural productivity leads to agricultural growth and poverty alleviation for the poor. Therefore, it is important for countries to include all the dimensions of agricultural productivity as per the BR framework, especially Togo which did not have indicators in this category. The lack of focus on this indicator could reflect the abundance of labour in Africa's agricultural sector.

Interestingly, Cote d'Ivoire was also the only country that included an indicator on mechanisation. Mechanisation could lead to labour-shedding, while many African governments focus attention on labourabsorbing investments. However, investment in mechanisation is essential for reducing the drudgery and burden of agricultural activities (especially for women) and attracting and keeping the youth engaged in agriculture. It may be important to balance this with including indicators measuring the labour-absorption of the agricultural sector, potentially driving inclusive growth (see indicator 4.3)

	Cour	ntries									
Performance indicator	Benin Manu	to race burkina Faso	pu: cote d'Ivoire	Edunca Guinea	ht Guinea-Bissau	AIIs VIperia	Malawi	Niger	Nigeria	Togo	Total
3.2i Growth rate of agriculture value added, in constant US dollars, per agricultural worker	0	0	2	0	0	0	0	0	0	0	2
3.2ii Growth rate of agriculture value added, in constant US dollar, per hectare of agricultural arable land	1	1	1	0	3	1	2	2	2	0	13
3.2iii Growth rate of yields for the five national priority commodities, and possibly for the 11 African Union agriculture priority commodities ⁴	3	8	4	2	17	2	2	6	0	0	44
Total	4	9	7	2	20	3	4	8	2	0	59

Table 7. Findings of the Comparison of the NAIPS and the BR Performance Theme 3.2

⁴ Rice, maize, llegumes, cotton, oil palm, beef, dairy, poultry and fisheries, cassava, sorghum and millet.

Eight of the ten countries included indicators measuring land productivity and yields. Nigeria' and Togo did not include indicators for yields. This is a surprising finding given Nigeria's active research agenda and spending on agricultural research and policy context.

Guinea only included two indicators on yields in this sub-theme, but these were commendably disaggregated by sex. Benin, Burkina Faso, Guinea-Bissau, Liberia, Malawi and Niger included indicators on both the yields and land productivity. The lack of focus on labour productivity is not a surprising finding given the focus on agricultural inputs described above (see indicators in sub- theme 3.1). The emphasis in many of the NAIPs was on expanding production and increasing yields rather than on labour-saving interventions.

6.3.3. Post-harvest Loss

Post-harvest losses had a total of 19 indicators from nine of the ten NAIPs under review (Table 8). Burkina Faso was the only country that included an indicator related to post-harvest losses. Benin, Guinea and Liberia included only the post-harvest loss indicator as per the BR framework. However, it should be noted that the BR does not specify the methodology for calculating these losses.

Guinea Bissau and Nigeria only included the number of storage facilities built and that were functional. Cote d'Ivoire, Malawi and Niger can be commended for listing indicators for both storage facilities and food losses. Only Togo included an indicator on the number of beneficiary cooperatives with "know-how" (technical expertise) in post-harvest pre-processing. Niger included indicators for the establishment of solar energy powered cold rooms and non-timber forest products (e.g., honey) storage facilities created.

Malawi included indicators for both pre- and post-harvest losses for crops and livestock. Malawi also included a unique indicator for aflatoxin levels in maize and groundnuts. This country also included an indicator for the area of crop affected by pest outbreaks per seasons as well as the mortality rates for livestock and chickens.

6.3.4. Social Protection

The BR included only one indicator on social protection, namely 'budget lines (%) on social protection as a percentage of the total resource requirements for coverage of the vulnerable social groups' (Table 9). Only Cote d'Ivoire included this specific indicator (on budget line %). Cote d'Ivoire, Guinea, Guinea-Bissau Niger and Togo included a range of indicators for social protection.

Table 8. Findings of the Cor	nparison of the NAIPS	and the BR Performance	Theme 3.3
Tuble of Thighigs of the Gol			

	Count	Countries													
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total				
	Numb	er of in	dicators	in the N	VAIPs										
3.3 Post-harvest losses	1	0	3	1	1	1	5	5	1	1	19				

	Countries											
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total	
	Number of indicators included in the NAIPs											
3.4 Social protection	0	0	2	1	1	0	0	9	0	1	14	

 Table 9. Findings of the Comparison of the NAIPS and the BR Performance Theme 3.4

Cote d'Ivoire had an indicator for the coverage of school feeding programmes. Four countries included indicators that measured the number or proportion of households benefitting from social protection programmes. Cote d'Ivoire, Guinea, Guinea-Bissau and Niger included indicators measuring the number of beneficiaries participating in social protection programmes. However, this data was not disaggregated by sex.

Niger included nine indicators for social protection. Four of these measured the number of people participating in specific social protection programmes. Niger is the only country that included a measure of the coverage of these programmes against the number of people with severe food insecurity (or needing support). Niger is also the only country that measured the outcome of social protection programmes by including the indicator 'guarantee and secure the access of the most vulnerable to income and livelihoods'.

None of the countries included measures on the impact of social protection programmes on food security and nutrition. Such indicators are needed to determine if the programmes that are implemented are improving people's lives (such as the quality of life, child nutrition etc.). Niger measured the existence of policy documents and an institutional framework for implementing social protection programmes. Niger also included an outcome indicator for social protection programmes mentioned above.

The lack of social protection indicators does not necessarily mean that social protection programmes are not implemented in these countries. For example, the Ministry of Gender, Children, Disability and Social Welfare in Malawi has implemented cash transfer and microfinance programmes. However, no indicators for social protection were included in Malawi's NAIP; perhaps suggesting a limited understanding by countries of the critical role social protection plays in improving food security. It could also suggest that the drafters of the NAIP had limited knowledge of existing programmes implemented by other ministries and departments that could contribute towards improving food security and/or that the drafting team did not include officials knowledgeable about Malawi's social protection is a widely recognised instrument for addressing the food insecurity and malnutrition situation of the most vulnerable and marginalised sectors of society.

6.3.5. Food Security and Nutrition

This analysis showed that all ten country NAIPs assessed included indicators on nutrition (Table 10), suggesting an increased appreciation of the importance of nutrition in achieving food security. No country included all the indicators in this sub-theme of the BR. Four countries, Guinea, Liberia, Malawi and Niger, included four of the six BR indicators on food security and nutrition. Benin, Cote d'Ivoire and Nigeria included two indicators from the BR. Burkina Faso and Guinea-Bissau included one indicator. Togo did not include any indicators from the BR.

	Cour	ntries									
Performance indicator	Benin Manu Manu	bo tage burkina Faso	spin cote d'Ivoire	Eduinea Guinea	pap Guinea-Bissau	Liberia	Malawi MIPU	s. Niger	Nigeria	Togo	Total
3.5i Prevalence of stunting (% of children under 5 years old)	1	0	0	1	0	2	1	3	1	0	9
3.5ii Prevalence of underweight (% of children under 5 years old)	0	0	0	1	0	2	1	1	0	0	5
3.5iii Prevalence of wasting (% of children under 5 old)	0	0	0	1	0	3	0	1	0	0	5
3.5iv Proportion of the population that is undernourished (% of the country's population)	0	1	1	0	1	1	0	1	1	0	6
3.5v Growth rate of the proportion of Minimum Dietary Diversity- Women	1	0	1	1	0	0	1	0	0	0	4
3.5vi Proportion of 6-23 months old children who meet the Minimum Acceptable Diet	0	0	0	0	0	0	1	0	0	0	1
Sub-total	2	1	2	4	1	8	4	6	2	0	30
Country innovations 3.5vii Number of nutrition education communication and behaviour change themes in the region	1	1	0	1	1	1	1	3	0	0	9
3.5viii Prevalence of anaemia in women of childbearing age (15 to 49 years) (%)	0	0	0	0	0	0	0	1	0	0	1
3.5ix Prevalence of anaemia in children (%)	0	0	0	0	0	0	0	1	0	0	1
3.5x Strengthening nutrition- specific and nutrition-sensitive actions	0	0	0	0	0	0	0	2	0	0	2
3.5xi Reduction in number of people requiring food assistance	0	0	0	0	0	0	1	0	0	0	1
3.5xii Number of fortification initiatives	0	0	0	0	0	0	0	0	1	2	3
3.5.xiii Quantity of biofortified foods produced	0	0	0	0	0	0	0	0	0	2	2
3.5xiv Number of nutrition rehabilitation centres	0	0	0	0	0	0	0	0	3	0	3

Table 10. Findings of The Comparison of the NAIPS and the BR Performance Theme 3.5

	Countries											
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	pep Guinea-Bissau pe	Liberia	Malawi	Niger	Nigeria	Togo	Total	
	INUIII		muica		ciudeu	in the	INTIF	5	1	1		
3.5xv Exclusive breastfeeding rate (%)	0	0	0	0	0	0	0	0	1	0	1	
Sub-total	1	1	0	1	1	1	2	7	5	4	23	
Total	3	2	2	5	2	9	6	13	7	4	53	

Nine countries included indicators for malnutrition. These include indicators measuring stunting, proportion of the population that is underweight, wasting and the proportion of the population that is undernourished. In some cases, malnutrition was the only measure included without indicating how it would be measured.

The most commonly included indicator representing this theme was the proportion of stunted children under five years of age. Only Malawi included the proportion of 6-23 months old children who meet the Minimum Acceptable Diet (BR indicator 3.5vi) in the final adopted NAIP (after the intervention of the research team).

Malawi, Niger, and Togo included innovative indicators that could improve the BR indicator set in this theme. These indicators were captured as indicators 3.5vii – xi in Table 10.

The BR offers a limited number of indicators on nutrition and many of these indicators focus only on undernutrition, wasting and underweight. However, several other challenges perpetuate malnutrition; these include micronutrient deficiencies, overweight and obesity, cultural practices and incorrect eating habits.

Niger included five indicators that were not part of the BR. Two indicators measured anaemia in women of childbearing age and children. Micronutrient deficiencies continue to constrain food security, health as well as productivity. Including this indicator reflects a recognition by the country of the importance of addressing micronutrient deficiencies. Niger also includes an indicator on 'households with chronic food insecurity', suggesting that the drafters are aware that different levels of food insecurity exist. This type of data can improve programme design, by ensuring that programmes are tailored to address the different levels of food insecurity under which people fall. Niger also included indicators on nutrition education and communication, suggesting a recognition that behaviour change is an essential contributor to improved nutrition. Niger included indicators for the number of nutrition rehabilitation centres. Niger was also the only country to include an indicator on exclusive breastfeeding.

Malawi included the indicator 'reduction in a number of people requiring food assistance per year'. Given the increased number of people vulnerable to food insecurity as a result of persistent whether shocks over the past three years in Malawi, this indicator is useful, not only in measuring food insecurity, but also measuring progress on food security as well as resilience.

While Togo did not include any of the BR indicators, it included two indicators that the BR overlooked: indicators that measure initiatives related to fortification and biofortification.

Several of the country NAIPs included the number or proportion of people who were food (in)secure but did not indicate how this would be measured. Similarly, several NAIPs included an indicator for improvements in

malnutrition but the indicators that will be used for measuring improvements are not mentioned. Benin and Cote d'Ivoire should provide more information on what indicator will be used to measure malnutrition. Burkina Faso, Guinea, Guinea-Bissau, Liberia and Malawi should provide clarity on the indicators that will be used to measure food security/insecurity. Nigeria should provide clarity on the indicators for malnutrition and should also include other food security and nutrition indicators.

In most NAIPs, the beneficiaries of programmes were not identified. Niger identifies two sets of beneficiaries, namely women and children. Other vulnerable groups, including the elderly, are not considered.

Indicator 3.5 on food security and nutrition should be renamed. Calling it 'food security and nutrition' gives a false sense that this is the only section that measures food security. The suite of indicators is predominantly focused on nutrition-specific indicators at the neglect of nutrition-sensitive (for example: yield of foods with nutritive value, fortification, biofortification and cold storage for perishable nutritious foods). Indicators on water, health and sanitation need to be included in the BR as these have implications for nutrition.

6.4. BR Performance Theme 4: Eradicating Poverty through Agriculture

None of the countries included all the performance indicators in performance theme 4 (Table 11). Cote d'Ivoire had the highest (19) and most exhaustive list of country indicators under theme 4, but did not include BR indicator 4.1v (reduction rate of the gap between the wholesale price and farm gate price). Guinea Bissau included 19 indicators in this theme, while Togo's NAIP only had two performance indicators under theme 4.

Except for Togo and Malawi, the highest proportion of indicators in this theme sought to monitor the growth rate of agriculture value added (4.1i). Where the frequencies were high for this indicator, the country usually listed indicators for each priority commodity. Guinea Bissau, Cote d'Ivoire, and Burkina Faso specifically prioritised fish as a commodity.

Togo did not include this indicator in their NAIP monitoring and evaluation framework. This raises a concern as Togo's NAIP had a strong focus on productivity (indicator 3.1,) but neither included indicators on yield (3.2iii), nor included the growth rate. It could reflect a focus on programmes rather than agriculturedriven growth or the competitiveness of their agricultural sector. This is a missed opportunity to focus on growth and the linkages of agricultural growth and poverty reduction. The omission also constrains the potential for mutual accountability and the impact these should have on the overall growth and development agenda.

Of the three BR indicators for the reduction in the rate of poverty (BR indicators 4.1ii, 4.1iii and 4.1iv) Benin and Togo only included 4.1iii (the reduction rate of poverty against the national poverty line). Guinea Bissau, Liberia, and Nigeria did not include a measure for 4.1iii which monitors the poverty reduction rate using national poverty lines. Cote d'Ivoire and Malawi included a measure for 4.1iv which monitors the poverty reduction rate using international poverty lines. Cote d'Ivoire used a poverty line of \$1.25 per day compared to the current international poverty line, set at \$1.90 a day used in the BR.

	Cou	ntries									
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total
	Indic	cators	included	in the	NAIP	S					
4.1i Growth rate of the agriculture value added, in constant US dollars	8	8	5	2	11	4	1	10	2	0	51
4.1ii Agriculture contribution to the overall poverty reduction target	0	2	2	1	1	2	2	2	1	0	13
4.1iii Reduction rate of poverty headcount ratio, at national poverty line (% of population)	1	2	4	1	0	0	2	2	0	1	13
4.1iv Reduction rate of poverty headcount ratio at international poverty line (% of population)	0	0	1	0	0	0	1	0	0	0	2
4.1v Reduction rate of the gap between the wholesale price and farm gate price	0	0	0	0	3	0	0	0	0	0	3
4.2 Number of priority agricultural commodity value chains for which a public-private-partnerships is established with strong linkage to smallholder agriculture	1	0	2	1	1	2	1	0	1	1	10
4.3 Percentage of youth that is engaged in new job opportunities in agriculture value chains	1	2	4	2	3	0	0	1	3	0	16
4.4 Proportion of rural women that are empowered in agriculture	1	0	1	2	0	0	0	0	1	0	5
Total	12	14	19	9	19	8	7	15	8	2	113

Table 11. Findings of the Comparison of the NAIPS and the BR Performance Theme 4

No country included indicator 4.1v (reducing the gap between the wholesale price and the farm gate price). This is a neglected area of focus in the NAIPs and a significant shortfall. The omission may reflect a low level of agricultural development and commercialisation in these countries and the lack of wholesalers that could bring about a differential in the farm gate and wholesale prices. As agricultural transformation progresses and value chains develop, this will be an important indicator to monitor as access to food is partially determined by farm profitability and consumer affordability.

Although Guinea-Bissau did not include an indicator monitoring the gap between the wholesale price and the farm gate price, the country included three indicators comparing the farm gate to the consumer price index. This reflects an awareness that food security includes an element of affordability and access beyond the mere availability of food. The low level of inclusion of this indicator may reflect a lack of understanding of the true

meaning of food security and the four elements of this concept (availability, access, nutrition and resilience) and the linkages with agricultural growth among the drafting teams.

Burkina Faso and Niger did not include 4.2 (the number of priority commodities for which public-private and civil society partnerships is established with a strong link to farmers). Liberia, Malawi and Togo did not include an indicator for determining the proportion of youth engaged in new job opportunities in agriculture value chains. Benin and Guinea disaggregated this indicator by sex. One suggestion to the countries is that the age range for youth should be defined as per the BR (15 - 34 years) for consistency and comparisons between countries and, perhaps, whether the person is independent or a dependent in a household.

The average income increase and income inequality index of rural households in Guinea were disaggregated by sex. Nigeria and Malawi included an indicator to monitor contract farming and medium-large scale farmers' participation in the economy.

Only Nigeria included the Women's Empowerment in Agriculture Index as per the BR indicator set for this sub-theme. Benin and Guinea included indicators for women's participation in governance and Cote d'Ivoire included an indicator for the proportion of female farm managers. Burkina Faso, Guinea-Bissau, Liberia, Malawi, Niger and Togo did not include an indicator for determining women's empowerment.

6.5. BR Performance Theme 5: Intra-African Trade in Agricultural Commodities and Services

All ten countries assessed included the BR indicator for intra-African trade in agricultural commodities (Table 12). Of the ten NAIPs analysed, only Guinea-Bissau and Nigeria did not sign the recently adopted Africa Continental Free Trade Agreement at the 10th Extraordinary session of the Assembly of the African Union in 2018. Guinea-Bissau had the greatest number of indicators in this theme, with 12 indicators related to measuring the growth rate of the value of agricultural commodities traded within Africa.

	Cour	ntries									
Performance indicator	Benin Benin	atota 1 suota 1 suota	pp pp pp pp pp pp pp pp pp pp pp pp pp	tu in p	e N IV Guinea-Bissau	sd Liberia	Malawi	Niger	Nigeria	Togo	Total
5.1 Growth rate of the value of trade of agricultural commodities and services within Africa, in constant US dollars	6	4	5	3	12	1	3	2	3	0	39
5.2i Trade Facilitation Index (TFI)	0	0	0	0	0	0	3	1	0	0	4
5.2ii Domestic Food Price Volatility Index	0	0	0	0	0	0	1	0	0	0	1
Total	6	4	5	3	12	1	7	3	3	0	44

Table 12. Findings of the	Comparison of the NAIPA	and the BR Performance Theme 5
rusie in rings of the	Companyon of the fille	

The indicators included in the NAIPs covered a range of elements related to the export and import trade balance. Liberia had no indicators for imports and one indicator for exports. Togo did not include indicators in theme 5.1. Only Malawi and Niger included the Trade Facilitation Index (TFI). This indicator relates to the reduction of non-tariff barriers.

Only Malawi included an indicator for domestic price volatility. This is a major omission from the other NAIPs as price volatility affects the conditions for trade as well as consumer affordability.

6.6. BR Performance Theme 6: Resilience to Climate Variability

The number of indicators in this performance theme reflects a strong awareness of climate change and its threats to production and food security among the ten countries. Niger and Burkina Faso had the highest number of indicators in this theme respectively (Table 13). Nigeria did not include indicators in this performance theme.

Benin, Guinea and Nigeria did not include indicators for the proportion of farm, pastoral and fisher households that are resilient to climate and weather-related shocks (6.1i). The indicator for this measurement in the BR is the Resilience Index Measurement and Analysis Model (RIMA) – a newly developed Food and Agriculture Organisation tool (FAO 2016), which has not yet been operationalised in all countries.

	Cour	ntries									
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total
	Num	ber of	indica	tors in	cluded	in the	NAIF	s	1		
6.1i Percentage of farm, pastoral, and fisher households that are resilient to climate and weather related shocks	0	5	1	0	1	2	1	3	0	1	14
6.1ii Share of agriculture land under sustainable land management practices (SSLM)	1	20	7	2	17	5	2	29	0	5	88
6.2 Existence of government budget-lines to respond to spending needs on resilience- building initiatives	2	3	2	0	3	0	0	10	0	3	23
6.2i Number of households affected by climate related shocks	0	0	0	0	0	0	0	2	0	2	4
Total	3	28	10	2	21	7	3	44	0	11	129

Table 13. Findings of the Comparison of the NAIPS and the BR Performance Theme 6

The highest number of indicators in this performance theme was for the share of agriculture land under sustainable land management practice (88). Only Nigeria did not have this indicator. Niger had the highest number of indicators (29) in this theme, followed by Burkina Faso due to a disaggregation of agricultural land use zones.

Guinea, Malawi and Nigeria did not include indicators on the existence of government budget lines for resilience-building initiatives. Niger had the highest number of indicators (10) under this indicator going beyond reporting only on budget lines; including indicators on carbon mobilisation rates, the existence of early warning systems, insurance and risk coverage and strategic food reserves. These indicators reflect an understanding of the broader risk and resilience priorities to ensure food security.

Niger and Togo were the only countries that included indicators for the number of households affected by climate-related shocks.

6.7. BR Performance Theme 7: Mutual Accountability for Actions and Results

There were very few indicators related to this performance theme that focuses on the quality of reporting for the BR and the capacity to generate statistical information for the preparation of the BR (Table 14). As indicated above, this is not surprising as the performance theme of the BR is specific to the capacity to prepare and submit a BR report and the process of doing so.

Nigeria did not include an indicator related to the capacity to generate statistical information, while Togo had six indicators in this component.

Most indicators included in this theme related to the rate of execution of projects and programmes of the NAIP. Burkina Faso, Benin and Guinea-Bissau explicitly mentioned the number of joint sector reviews completed. Burkina Faso included indicators for the number of scientific studies conducted and papers published. Togo included an indicator for the publication of an agricultural census report.

	Cour	ntries	-	-					-	-	
Performance indicator	Benin	b taso b taso	Cote d'Ivoire	Guinea	d Guinea-Bissau	d Liberia	Malawi	Niger	Nigeria	Togo	Total
7.1 Index of capacity to generate	1 Vuiii		marca								
and use agriculture statistical data and information (ASCI)	1	2	1	1	2	1	1	3	0	6	18
7.2 Existence of inclusive institutionalised mechanisms and platforms for mutual accountability and peer review	1	5	0	1	5	3	1	4	0	3	23
7.3 Country Biennial Report submission	0	2	0	0	0	1	0	0	0	0	3
Total	2	9	1	2	7	5	2	7	0	9	44

Otherwise, countries only listed indicators reflecting the number of reports produced. Only Guinea-Bissau listed the existence of a system of strategic analysis, review and knowledge management in the agricultural sector as an indicator. Liberia included an indicator for the quality of the country management team performance.

Cote d'Ivoire and Nigeria did not include indicators relating to the existence of inclusive institutionalised mechanisms and platforms for mutual accountability and peer review. The lack of indicators may reflect a lack of understanding of what mutual accountability refers to and involves. Significant improvements could be put into effect in this section of the NAIPs to align them with the CAADP and Malabo objectives and make use of mutual accountability mechanisms to support the implementation of the NAIP and its monitoring and performance functions.

6.8. Innovations not Captured by the BR Performance Themes but Found in the NAIPs

One hundred and twenty indicators were found in eight of the NAIPs (except Guinea and Nigeria) that were not included in the BR indicator set. Many of these are relevant to the monitoring and evaluation framework of Agenda 2063 and/or the SDGs (see sections below).

Most of the indicators we found in this regard related to the rate of commercialisation of agricultural value chains and infrastructure development. Eight countries included an indicator for (3.1vii) the adoption of new technologies, except Malawi and Nigeria (Table 15). This is discussed in section 6.3. Four indicators were found in section 3.5 (food security) that were not included in the NAIP. These are discussed in section 6.4.

	Cour	ntries									
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total
		ber of				1				_	
8.1 Infrastructure development	0	3	1	0	4	2	0	34	0	5	49
8.2 Communication and media	0	0	0	0	0	0	0	6	0	2	8
8.3 Commercialisation	0	2	1	0	3	0	1	7	0	8	22
8.4 Energy	0	0	0	0	0	0	0	0	0	1	1
8.5 Beneficiary identification- specifically vulnerable group	0	1	0	0	0	0	0	0	0	0	1
8.6 Diversification	0	1	0	0	0	0	0	1	0	1	3
8.7 Impact on the quality of life	0	1	2	0	0	0	0	1	0	0	4
8.8 Capacity to implement beyond extension	0	1	0	0	0	0	0	2	0	0	3
8.9 (WASH)Water, health and sanitation	0	16	0	0	0	0	0	2	0	0	18
8.10 Recovery of service fees	0	1	0	0	0	0	0	0	0	0	1

Table 15. Innovative Indicators Found in the NAIPs and not in the BR Performance Themes

	Cour	ntries							1		
Performance indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo	Total
8.11 Execution rate of public											
expenditure	6	1	0	0	1	0	0	0	0	2	10
8.12 Conflict reduction rate	0	1	0	0	0	0	0	1	0	1	3
Total	6	28	4	0	8	2	1	54	0	20	123

Six countries listed indicators for infrastructure development. Niger had the highest and most wide-ranging indicator set in this category, including infrastructure development for a diversity of commodities including livestock, fisheries, non-timber forest products, manufacturing, processing as well as market infrastructure.

Only Niger and Togo included indicators for communicating and publicising their NAIPs. Niger's communication and media indicators included the existence of a communication strategy, its action plan and behavioural change as a result of information education communication. Their NAIP also include indicators for the number of pastoral campaigns and awareness actions to improve livestock. Togo's indicators measured the media coverage of activities related to their NAIP and the number of communication support systems developed.

Burkina Faso, Cote d'Ivoire, Guinea-Bissau, Malawi, Niger and Togo included indicators related to the rate of commercialisation of agricultural products. Togo's commercialisation indicators focused on improving food safety regulations and the accreditation of agencies to achieve international standards.

Togo was also the only country to include indicators on the use of renewable energy. Otherwise, overall there were very few indicators that focused on renewable energy and the recovery of services fees (mostly from water users).

Cote d'Ivoire, Niger and Togo listed indicators on the diversification of agricultural production. Burkina Faso measured the diversification index of all agricultural production whilst Niger only focused on diversification of animal production. The Togo indicator measures the number of farm households also engaged in non-farm activities.

Cote d'Ivoire and Niger were the only countries with indicators on the impact to the quality of life with the former measuring the 'Human Sustainability Index'.

Burkina Faso and Niger included indicators measuring the capacity to implement beyond agricultural extension services. Niger's indicators focused on improving the technical and operational capacities of the institutional actors and the approaches and tools for implementing the 'Nigeriens Nourishing Nigeriens'(3N) initiative.

Burkina Faso and Niger also included indicators on access to drinking water, sanitation and hygiene (WASH). Burkina Faso's indicators focused on the rate of access to drinking water and sanitation for both rural and urban areas, while Niger focused on access to safe drinking water in rural areas only. These countries also included an indicator reflecting the rate of execution of the agricultural budget. Benin, Burkina Faso, Malawi and Togo included indicators relating to the execution rate of the budget. Only Benin included an indicator on the capacity to spend. Benin also had indicators related to annual and cumulative budget forecasts and gaps in funding. Togo included an indicator reflecting the time taken for awarding contracts as a measure related to the ease of doing business and creating an enabling environment for trade.

Burkina Faso, Niger and Togo included indicators on reducing conflict. Burkina Faso's indicator focussed on conflict between pastoralists and other natural resources users. Considering that most of the West African countries have sizeable pastoralist communities, it is surprising that only two countries recognised this element as worthy of monitoring.

6.9. A Note on Gender

While the BR has a component on women's empowerment, there are many areas where sex-disaggregated data could support the monitoring of progress towards women's empowerment and addressing inequalities. The BR's focus on women likely influenced this oversight as opposed to gender (the power relationships and dynamics between men and women). The BR should consider how gender dynamics may constrain men and women's ability to contribute to agriculture, food security and nutrition. A gender analysis of each sub-theme would be important to ensure that gender is mainstreamed throughout the BR. Integrating gender in all policies, programmes and development activities is a commitment many African countries made by signing the 1995 Beijing Declaration and Platform for Action (UN 1995).

Many of the indicators included in the NAIPs do not advance gender equality. Instead, they only provide women with the tools needed to address their immediate needs. For example, training women only provides women with skills. The constraints that women face in being able to use these skills is not addressed. Gender analysis training is needed for NAIP teams before the drafting process commences. Gender analysis should also be conducted to ensure that gender is appropriately integrated in the final NAIP.

7. COUNTRY NAIPS AND AGENDA 2063'S FIRST 10-YEAR IMPLEMENTATION PLAN (2014 – 2023)

Agenda 2063 comprises seven overarching aspirations, 34 priority areas, 20 goals, 174 targets and 200 indicators. This is a slightly different organisational structure to the BR and the SDGs. Agenda 2063 is divided into five 10-year implementation periods. The first 10-year implementation plan covers the period 2014-2023 (UNECA 2017). Table 16 sets out the goals of Agenda 2063 and reports whether each NAIP had indicators that matched the indicators from the Agenda 2063 indicator set. It should be noted that we did not expect full alignment between the indicators in Agenda 2063, the BR and the NAIPs as Agenda 2063 covers a far broader development agenda and vision for Africa than the BR and NAIPs, which focus on supporting the achievement of the Malabo Declaration.

Agenda 2063 (First 10-year Implementation Plan (2014 – 2023))								n the A (2014 -	0	
Goal 1. A high standard of living, quality of	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo
Goal 1. A high standard of living, quality of life and well-being for all	~	\checkmark	\checkmark	\checkmark	\checkmark	~	~	~	\checkmark	✓
Goal 2. Well educated citizens and skills revolution underpinned by science, technology and innovation	Х	Х	Х	Х	Х	Х	Х	Х	Х	X
Goal 3. Healthy and well-nourished citizens	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark
Goal 4. Transformed economies and job creation	~	~	~	~	~	~	~	~	~	~
Goal 5. Modern agriculture for increased productivity and production	~	~	~	~	~	~	~	~	~	~
Goal 6. Blue/ocean economy for accelerated economic growth	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х
Goal 7. Environmentally sustainable climate resilient economies and communities	~	~	~	~	~	~	~	~	~	~
Goal 8. United Africa (federal or confederate)	~	✓	~	✓	✓	✓	~	~	✓	Х
Goal 9. Key continental financial and monetary institutions established and functional	Х	Х	Х	Х	Х	Х	Х	Х	Х	X
Goal 10. World class infrastructure criss- crosses Africa	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х

Table 16. Summary of Alignment of the NAIP, BR and Agenda 2063's First 10-year Implementation Plan (2014 – 2023) Indicators

Agenda 2063 (First 10-year Implementation Plan (2014 – 2023))		Alignment of indicators in the NAIPs with the Agenda 2063's First 10-year Implementation Plan (2014 – 2023) goals											
Goal 11. Democratic values, practices,	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo			
Goal 11. Democratic values, practices, universal principles of human rights, justice and the rule of law entrenched	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х			
Goal 12: Capable institutions and transformed leadership in place at all levels	~	✓	Х	~	~	✓	✓	✓	✓	Х			
Goal 13. Peace, security and stability are preserved	Х	~	Х	Х	Х	Х	Х	~	Х	~			
Goal 14. A stable and peaceful Africa	Х	Х	Х	Х	Х	Х	Х	Х	Х	х			
Goal 15. A fully functional and operational African peace and security architecture	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х			
Goal 16. African cultural renaissance is pre- eminent	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х			
Goal 17. Full gender equality in all spheres of life	~	Х	~	✓	Х	Х	Х	Х	~	Х			
Goal 18. Engaged and empowered youth and children	~	~	~	~	~	~	Х	Х	~	~			
Goal 19. Africa as a major partner in global affairs and peaceful co-existence	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х			
Goal 20. Africa takes full responsibility for financing her development	Х	~	Х	Х	Х	Х	Х	Х	Х	~			
Total	9	10	8	9	8	8	7	8	9	8			

All ten country NAIPs assessed included indicators related to goal 1 (a higher standard of living, quality of life and well-being for all), 3 (healthy and well-nourished citizens), 4 (transformed economies and job creation), 5 (modern agriculture for increased productivity) and production) and 7 (environmentally sustainable climate resilient economies and communities) of Agenda 2063's First 10-year Implementation Plan (2014 – 2023)). It should be noted that only one country (Cote d"Ivoire) indicated indicators for the mechanisation of the agricultural system.

Nine of the 20 goals (goals 2, 6, 9, 10, 11, 14, 15, 16, and 19) had no coverage in the NAIPs. Except for Togo, all the countries included indicators on Agenda 2063's First 10-year Implementation Plan (2014 – 2023) goal 8 (United Africa); with all the related indicators focusing on the intra-African trade of agricultural commodities. Eight of the NAIPs included indicators on goals 12 (capable institutions and transformed leadership) and 18 (engaged and empowered youth and children).

Benin, Cote d'Ivoire, Guinea and Nigeria included indicators on goal 17 (Gender Equality). Although agriculture was the focus of most NAIPs, three countries (Burkina Faso, Niger and Togo) included indicators on goal 13 (peace, security and stability). Only Burkina Faso and Togo included indicators related to goal 20 (Africa's takes full responsibility for financing development). There are a number of Agenda 2063's First 10-year Implementation Plan (2014 - 2023) indicators that could be considered in improving both the NAIP monitoring and evaluation frameworks as well as the BR indicator set. One specific example of where the indicator set for Agenda 2063's First 10-year Implementation Plan (2014 - 2023) includes a target for economic diversification. Agenda 2063's First 10-year Implementation Plan (2014 - 2023) includes a target for economic diversification and resilience, setting a target for increasing the diversification index of 2013 by at least 20 percent by 2023. This diversity is essential for production, environmental stability, agricultural enterprises as well as sustainable livelihoods. Other examples where the NAIPs and BR could borrow ideas from Agenda 2063's First 10-year Implementation Plan (2014 - 2023) indicator set include:

- The First 10-year Implementation Plan (2014 2023) indicator set elaborates on the kinds of basic services available to citizens, including mention of water, sanitation, electricity, transportation and internet connectivity. All of these services are important elements for agricultural transformation and improving the income opportunities and livelihoods of people in Africa. Internet access is a means for accessing information for agricultural development and nutrition knowledge. The current drive to harness big data for development planning and early warning systems is dependent on internet access.
- The First 10-year Implementation Plan (2014 2023) specifically sets a target for 10 percent of agricultural GDP generated by commercial farmers. This is a significant shift from many of the NAIP plans that focus attention on smallholder agriculture as the driver of agriculture-led development. The focus on commercialisation in a couple of NAIPs draws attention to the need to shift production from smallholders to commercialisation. This is perhaps an area where more discussion is necessary to align not only the indicator sets but also the vision of CAADP and Agenda 2063.
- The First 10-year Implementation Plan (2014 2023) goal for environmentally sustainable climate resilience economies and communities includes both climate resilience and natural disasters, seeking to reduce death and property loss from natural and human-made disasters and extreme climate events by at least 30%. The inclusion of this broader definition of resilience would be of benefit to the NAIPs and the BR.
- The First 10-year Implementation Plan (2014 2023) includes specific indicators for the reduction of unemployment (reduction of the 2013 rate by 25 percent by 2023), unemployment among the vulnerable groups and youth employment in agricultural value chains. These more specific targets than the BR indicator for the number of jobs created in agricultural value chains. As population growth is high in Africa, monitoring the reduction in the unemployment rate as well as the number of new jobs created is important to determine real progress.

This section of the analysis indicates that the NAIPs and BR indicator sets could be more closely aligned with some of the Agenda 2063's First 10-year Implementation Plan (2014 - 2023) indicators to strengthen the food security and resilience elements.

We now turn to compare the NAIP and BR indicators with the international framework of the SDGs.

8. ALIGNMENT OF THE NAIPS, THE BR AND THE SDGS

The food security and nutrition-related indicators contained in the 17 SDGs were identified (see Appendix B). BR indicators were classified against the SDG indicator set and the number of NAIP indicators per country was identified. Appendix B presents the findings of this analysis. Table 17 presents a summary of the alignment of the NAIP indicators with the SDGs.

The SDGs only include two direct measures of food insecurity – the Food Insecurity Experience Scale (FIES) and the proportion of undernourished people. Only the latter indicator is included in the BR. Six countries (Burkina Faso, Cote d'Ivoire, Guinea-Bissau, Liberia, Niger and Nigeria) included this indicator in their NAIPs. No country included the FIES. However, the BR includes more indicators for child undernutrition as well as indicators for the quality of the diets that were not contained in the SDG indicator set. As there is no one accepted international indicator of food security, partly due to the complexity and multi-faceted nature of the concept, the inclusion of indicators that cover various aspects of availability, access, nutrition and the stability of food systems is essential. The SDGs include monitoring of the number of countries that mainstream and prioritise sustainable production and consumption practices. This goes beyond the monitoring of sustainable land use and postharvest losses contained in the BR and reflected in the NAIPs. This is an example of an area of contemporary focus in food security and nutrition discourses that is gaining increasing attention in the global domain. This concept has yet to be captured in the NAIPs.

Table 17. Thighnent of the 14111 Indeators with the 5D05										
	Aligr	nment	of the	NAIF	o indica	ators v	vith th	e SDG	is	
SDG Goals	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo
Goal 1. End poverty in all its forms everywhere	~	~	~	~	~	~	~	~	~	~
Goal 2. End hunger, achieve food security and improved nutrition and promote sustainable agriculture	~	~	~	~	~	~	~	~	~	~
Goal 3. Ensure healthy lives and promote well-being for all at all ages	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х
Goal 4. Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х
Goal 5. Achieve gender equality and empower all women and girls	~	Х	~	~	Х	Х	Х	Х	~	Х
Goal 6. Ensure availability and sustainable management of water and sanitation for all	Х	~	Х	Х	Х	Х	Х	~	Х	Х
Goal 7. Ensure access to affordable, reliable, sustainable and modern energy for all	Х	Х	Х	Х	Х	Х	Х	Х	Х	~

Table 17. Alignment of the NAIP Indicators with the SDGs

SDG Goals		nment	of the	NAII	o indica	ators v	vith th	e SDC	is	
SDG Goals	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-Bissau	Liberia	Malawi	Niger	Nigeria	Togo
Goal 8. Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all	~	>	~	~	~	~	>	~	~	~
Goal 9. Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation	~	Х	Х	~	~	~	Х	Х	~	Х
Goal 10. Reduce inequality within and among countries	Х	Х	Х	х	Х	Х	Х	Х	Х	Х
Goal 11. Make cities and human settlements inclusive, safe, resilient and sustainable	Х	Х	Х	Х	Х	Х	Х	Х	Х	Х
Goal 12. Ensure sustainable consumption and production patterns	~	~	~	~	~	~	✓	~	~	~
Goal 13. Take urgent action to combat climate change and its impacts	~	~	~	~	~	~	~	~	Х	~
Goal 14. Conserve and sustainably use the oceans, seas and marine resources for sustainable development	Х	Х	Х	Х	Х	Х	Х	Х	Х	X
Goal 15. Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss	Х	~	~	~	~	~	Х	~	Х	✓
Goal 16. Promote peaceful and inclusive societies for sustainable development, provide access to justice for all and build effective, accountable and inclusive institutions at all levels	Х	✓	Х	X	Х	Х	X	~	Х	~
Goal 17. Strengthen the means of implementation and revitalize the Global Partnership for Sustainable Development	~	*	~	~	~	~	~	~	~	~
Total	8	9	8	9	8	8	6	9	7	9

Each NAIP evaluated had some coverage for SDG1, SDG2, SDG8, SDG12, SDG13, and SDG17. Nigeria did not have indicators related to SDG13 (climate change). Gaps were noted for many countries regarding SDG5 (gender equity), SDG6 (WASH), SDG 10 (inequality), SDG11 (cities) and SDG16 (peace). As with

Agenda 2063's First 10-year Implementation Plan (2014 – 2023) goal 13, only three countries (Burkina Faso, Niger and Togo) included indicators on SDG 16 (peace). Only Burkina Faso included an indicator on the number of severe conflicts between pastoralists and other users of natural resources per year.

Only Togo had indicators related to sustainable energy (SDG7). Only five countries included indicators that fell into SDG9 (resilient infrastructure and inclusive and sustainable industrialisation).

Although the focus of most NAIPs was on agriculture, very few indicators related to agricultural transformation. The NAIP monitoring and evaluation frameworks were also silent on some areas in the SDGs. For example, countries such as Liberia and Nigeria do not have indicators related to social inclusion despite instability, conflict and migration being significant challenges to agriculture and food security, leaving many people hungry and malnourished.

Very few food security indicators were included in most NAIP indicator sets dealing with essential early warning systems, emergency and contingency plans and ensuring relief responses. Even regarding social protection, very few plans acknowledged the important role of social protection in stabilising crises, supporting livelihoods and stimulating demand for food and non-food goods.

Despite a significant amount of corruption in Africa, no indicators were found for managing and mitigating corruption.

One would have expected the NAIP framework and the BR indicators to focus indicator measurement towards bringing about sustainable development. However, it is clear that the CAADP and NAIP II guidance focusses strongly on agriculture and food security. However, despite the spirit set out in the CAADP Results Framework (AU and NEPAD, undated b), the NAIPs have adopted a technically focused approach rather than an integrative approach to the design of their monitoring and evaluation frameworks. The SDGs go beyond the technical issues. In the spirit of the SDGs, Agenda 2063 and the CAADP Results Framework, the NAIPs should address the question of how agricultural development and transformation (in its widest sense) can bring about societal change to further sustainable development. The NAIP should not operate in a vacuum (see Figure 2). Agriculture should be used to address broader development issues – not only to meet the BR requirements, but also advance the broader sustainable development agenda. Some of the indicators from the SDGs that could be considered to strengthen the NAIPs and BR include:

- Monitoring the number of deaths, missing persons and persons affected by disasters
- The average income of smallholders by sex and indigenous status
- Unemployment rate by sex, age and persons with disabilities
- The establishment or operationalization of an integrated policy/strategy/plan which increases a country's ability to adapt to the adverse impacts of climate change, and foster climate resilience and low greenhouse gas emissions development in a manner that does not threaten food production (including a national adaptation plan, nationally determined contribution, national communication, biennial update report or other).

9. CONCLUSIONS

The NAIP monitoring and evaluation frameworks were more compliant with the SDG indicators that were directly related to agriculture and food security. However, they do not exploit the opportunities to align in the areas of the SDGs that address some of the core aspirations of the CAADP agenda – seeking to advance agricultural transformation to reduce poverty, inequality and unemployment. However, a misalignment exists between the monitoring and evaluation frameworks of the NAIPs, the indicators of the BR and the first tenyear implementation plans for Agenda 2063. The sequencing of the drafting of the guidelines for the BR, Agenda 2063's First 10-year Implementation Plan (2014 – 2023) and the SDGs (Agenda 2030) and the NAIP drafting process explains most of the misalignment of indicators in the monitoring and evaluation frameworks. The design of many NAIPs was by and large completed before the SDG targets were finalised. The NAIPs are 5-year plans, offering an opportunity to revise the frameworks and align these more closely with the BR (which also needs to be enhanced) in future. This necessitates a review of the NAIP guidance to align with the BR in particular and calls for engagement of NAIP drafting teams with the teams responsible for the BR reporting.

It is clear that at a minimum, alignment of the NAIP indicators with the BR could provide more comprehensive coverage of indicators that generally overlap with both Agenda 2030 and Agenda 2063's First 10-year Implementation Plan (2014 - 2023). However, the BR could be strengthened from closer alignment with the SDGs. In some areas, adopting the broader specifications in the SDGs could lend more direction to the BR indicators and the CAADP process in general. For example, the SDGs include monitoring of the incomes of smallholders and the reduction in the rate of unemployment among vulnerable groups (including youth).

Some countries adopted a more progressive approach to designing their monitoring and evaluation frameworks, resulting in a higher proportion of indicators aligned with the three indicator sets. Niger and Cote D'Ivoire addressed most of the indicators aligned with the BR. In some frameworks, the indicators covered a range of indicators across the BR performance themes, while others were unbalanced and tended to focus more on some performance themes than others, especially regarding performance theme three of the BR that focused on food security. The lack of appreciation of the full scope of food security (beyond production) led to an imbalanced focus on production by some countries. Malawi and Liberia responded well to interventions and improved their indicator set. In the case of BR performance theme 3, Malawi's final NAIP II had a very balanced portfolio of indicators.

Niger's framework was elaborate, including a very large and extensive list of indicators. Nigeria did not include indicators from at least half the BR performance themes. Burkina Faso and Niger's monitoring and evaluation frameworks were very strong overall (even in category 8) in relation to the coverage of the BR indicators. It is not known why this is so. Niger's NAIP II was among the first to be launched and is already being implemented. Guinea and Nigeria had the least coverage of the BR performance themes.

An insufficient number of indicators focussed on the impact indicators of the CAADP Results Framework, namely wealth creation; food security and nutrition; economic opportunities, poverty alleviation and shared prosperity; and resilience and sustainability. BR performance theme 3 - ending hunger - had the highest number of indicators. However, the focus of this performance theme's indicators was predominantly on inputs and yields, with fewer indicators overall for the food security and nutrition-related themes and a few countries including indicators for social protection and post-harvest losses. There is room for improvement in the inclusion of more food security and related indicators, shifting the focus to the inclusion of impact indicators. The NAIP Toolkit (African Union (AU) 2018), provides ideas on indicators that can improve this element of the NAIP monitoring and evaluation frameworks as it includes indicators that cover hunger, food

security and nutrition. Countries can also draw on the indicators set out in Appendix A to establish baseline indicators.

Although the second highest performance theme coverage was in resilience to climate change, the focus in the BR on climate change meant the NAIPs neglected other elements of resilience related to food security, peace and migration. Climate change affects a wide range of food security and nutrition elements beyond production and post-harvest losses. System resilience spans elements of governance, food systems, peace and security as well as financial and political stability. Many contemporary food security issues such as migration relate to climate change.

Intra-Africa trade was the most neglected performance theme in the NAIPs, having the least number indicators. Mutual accountability had the second lowest number of indicators. These results raise the need for further investigation of why countries have neglected these themes.

A significant number of indicators were included in the NAIPs that were not in the BR and could be considered in improving the BR indicator set. For example, commercialisation was included in the NAIPs by six countries. This is a major focus of the African transformation agenda. The BR also lacks indicators for access to technology as included in some NAIPs. This is an area for consideration in future revisions of the BR. Infrastructure development was not well covered by the BR, but was included in the NAIP indicator sets by six countries.

Niger had a very strong nutrition-sensitive focus. This country's NAIP was an outlier and an interesting case as the country seems to have gone further than expectations in the analysis. It was also one of the first countries to launch their NAIP II (in 2016).

10. RECOMMENDATIONS

To ensure that the drafting and finalisation of NAIP IIs are fully compliant with the proposed comprehensive, integrated indicator set, there are some prerequisites, including but not limited to the following:

- i. The NAIP drafting team need to work closely with the team responsible for the preparation of the BR and other international development progress reporting systems (such as Agenda 2063's First 10-year Implementation Plan (2014 2023) and the SDGs).
- ii. The chair of the NAIP drafting team should be a knowledgeable, appropriately qualified senior person from the office of the President or Premier to ensure articulation with the country's broader development agenda and regional and international commitments.
- iii. The drafting team must be comprised of senior (director level) officials from all key national government departments, including amongst others, the department responsible for planning, finance and monitoring and evaluation and all other relevant sectoral departments.
- iv. It is essential that the African Union provide leadership and guidance on ensuring that national teams are sensitised and trained in understanding the treaties, declarations, agreements and sectoral frameworks and how they relate to and can be used to advance the SDGs, Agenda 2063's First 10-year Implementation Plan (2014 2023) and CAADP. Training on the African regional frameworks should be provided by the African Union to ensure policy coherence and alignment of the monitoring and evaluation frameworks with these commitments, including the proposed comprehensive indicator set and the key elements of the domestic constitutional, transversal and sector-specific policy and legal frameworks, as well as sector-specific implementation frameworks.
- v. Technical assistance and oversight relating to the compliance and oversight of both the content of the NAIP and the drafting process must be provided on a continual basis by the Africa Union.
- vi. The development of guidance tools and updates (such as the NAIP toolkit) are essential to support country teams in their efforts.
- vii. During implementation, the AU should pay an external oversight, intervention and remedial support role and provide guidance in the event of changing circumstances and events such as the passing of new agreements that affect the policy context (such as the recently signed African Free Trade Agreement).

Development planning at global, African and country level still seems confined to silos. Documents emanating from international agencies play lip service to the SDGs without capturing the core framework of the SDGs. As is evident from this analysis, country-level planning does not seem to consider substantive matters contained in the international, African and regional transversal sectoral frameworks in the drafting of policies, legislation, strategies and action plans.

The findings of the analysis raise the need for considerably more training on the BR, the design of the NAIP monitoring and evaluation and the alignment of these with Agenda 2063 and the SDGs to ensure compliance and improve the quality of reporting across the transversal development space.

Mid-term reviews of the NAIPs and their monitoring and evaluation frameworks could provide opportunities for updating and strengthening the frameworks and aligning these more closely with Agenda 2063's First 10-year Implementation Plan (2014 – 2023) and the SDGs. Although we have not analysed the alignment of the NAIP monitoring and evaluation frameworks with the countries' longer term national development plans and medium-term (usually five years) growth and development strategies (GDSs; sometimes referred to as medium-term strategic frameworks (MTSFs), this Agenda 2063's First 10-year Implementation Plan (2014 – 2023) is an area for further analysis and assessment.

REFERENCES

- African Union (AU). 2003. The Maputo Declaration on Agriculture and Food Security in Africa. Addis Ababa: AU.
- African Union (AU). 2006. Abuja Declaration on Fertilizer for the African Green Revolution. Addis Ababa: African Union Commission.
- African Union (AU). 2014a. Decisions, Declarations and Resolutions of the Assembly of the African Union. Addis Ababa: AU.
- African Union (AU). 2014b. Common African Position on the Post-2015 Development Agenda. Addis Ababa: AU.
- African Union (AU). 2014c. Science, Technology and Innovation Strategy for Africa 2024. Addis Ababa: African Union Commission.
- African Union (AU). 2015a. Agenda 2063: The Africa We Want. Addis Ababa: AU.
- African Union (AU). 2015b. Agenda 2063: First Ten-year Implementation Plan 2014 2023. Addis Ababa: AU.
- African Union (AU). 2017. Technical Guidelines for Preparing Country Biennial Review Report on Progress Made for Achieving the Malabo Declaration Goals and Targets. Addis Ababa: AU.
- African Union (AU). 2018a. Inaugural Biennial Review Report of the African Union Commission on the Implementation of the Malabo Declaration on Accelerated Agricultural Growth and Transformation for Shared Prosperity and Improved Livelihoods. Addis Ababa: AU.
- African Union (AU). 2018b. AU NAIP Toolkit for Malabo Domestication. Addis Ababa: AU.
- AUC. 2006. Abuja Declaration on Fertilizer for the African Green Revolution. Addis Ababa. AUC.
- African Union and the New Partnership for Africa's Development (AU and NEPAD). Undated a. Country CAADP Implementation Guidelines under the Malabo Declaration. Addis Ababa: AU/NEPAD.
- African Union and the New Partnership for Africa's Development (AU and NEPAD). Undated b. The CAADP Results Framework 2015 – 2025: Going for Results and Impacts. Addis Ababa and MidRand: AU and NEPAD.
- Communauté Economique des Etats de l'Afrique de l'Ouest (CEDEAO), République de Côte d'Ivoire (RCI) and Union Africaine (UA). 2012. Plan D'investissement Detaille Pour la Mise en Œuvre du Programme National D'investissement Agricolecm (2010 - 2015). Yamoussoukro: Communauté Economique des Etats de l'Afrique de l'Ouest, République de Côte d'Ivoire and Union Africaine. Food and Agriculture Organisation.
- FAO. 2016. Moving Forward with Development of the Resilience Index Measurement and Analysis Model (RIMA). Rome: FAO.
- Federal Ministry of Agricultural and Rural Development (FMARD). 2010. National Agriculture Investment Plan 2011-2014. Abuja: Federal Ministry of Agricultural and Rural Development.

- Federal Ministry of Agricultural and Rural Development (FMARD). 2017. National Agriculture Investment Plan 2. Abuja: Federal Ministry of Agriculture and Rural Development.
- Fofana, I. 2017. Appraisal, Design and Tracking: An Overview. Presentation Made at the NAIP Training Session, 21 May 2017. Dakar, Senegal.
- Government of Malawi (GM). 2017. National Agricultural Investment Plan. Lilongwe: Republic of Malawi.
- Government of Malawi (GM). 2018. National Agricultural Investment Plan. Lilongwe: Republic of Malawi.
- Hendriks, S.L. 2018. Food Policy and Nutrition Economics in the SDG Era. Agrekon, Forthcoming.
- Hendriks, Sheryl L. 2018. Food Policy and Nutrition Economics in the SDG Era. Agrekon. DOI: 10.1080/03031853.2018.1479974
- Malabo Montpellier Panel. 2017. Nourished: How Africa Can Build a Future Free from Hunger and Malnutrition. Dakar: Malabo Montpellier Panel.
- Malabo Montpellier Panel. 2018. Mechanised: Transforming African's Agricultural Value Chains. Dakar: Malabo Montpellier Panel.
- Ministere de L'Agriculture et du Developpement Rural (MADR) and Cabinet de Planification Agricole (CPA). 2013. programme national d'investissement agricole. Bissau: Ministere De L'Agriculture Et Du Developpement Rural and Cabinet De Planification AgricoleMinistere de
- Ministère de L'Agriculture (MA), Ministère de l'Elevage et des Productions Animales (MEPA0, Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime (MPAEM) and Ministère de l'Environnement et des Eaux et Forêts (MEEF). 2017. Plan national de sécurité agricole et alimentaire et nutritionnelle. Conakry: Ministère del'Agriculture, Ministère de l'Elevage et des Productions Animales, Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime and Ministère de l'Environnement et des Eaux et Forêts.
- Ministere de L'Agriculture (MA). 2010. Plan D'Investissement Agricole 2010-2015. Conakry: Ministere de L'Agriculture.
- Ministere de L'Agriculture (MA). 2012. Plan National D'investissement Agricole et de Securite Alimentaire 2013-2017. Conakry: Ministere de L'Agriculture.
- Ministere de L'Agriculture (MA). 2018. Liberian Agricultural Sector Investmet Plan. Monrovia: Ministry of Agriculture.
- Ministère de l'Agriculture et de l'Hydraulique (MAH), Ministère de l'Environnement et du Développement durable (MEDD) and Ministère des Ressources Animales (MRA). 2012. Programme National Du Secteur Rural. Ougadougou: Ministère de l'Agriculture et de l'hydrauliqueMinistère de l'environnement et du développement durable and Ministère des ressources animales.
- Ministère de l'Agriculture, de l'Elevage et de la Pêche (MAEP) and Ministere de L'Economie et des Finances (MEF). 2010. Plan d'Investissement Agricole 2010 - 2015. Porto Novo: Ministere de L'Agriculture, de L'elevage et de la Peche and Ministere de L'economie et des Finances.

- Ministère de l'Agriculture, de l'Elevage et de la Pêche (MAEP). 2010. Programme National D'Investissement Agricole et de Securite Alimentaire. Lome: ministère de l'agriculture, de l'élevage et de la pêche.
- Ministère de l'Agriculture, de l'Elevage et de la Pêche (MAEP). 2017. plan national d'investissement agricole. Bissau: ministère de l'agriculture, de l'élevage et de la pêche.
- Ministère de l'Agriculture, de l'Elevage et de la Pêche (MAEP). 2017. Plan stratégique pour le développement du secteur agricole (PSDSA): 2025 Orientations stratégiques. Porto-Novo: Ministère de l'agriculture, de l'élevage et de la pêche.
- Ministère de L'Agriculture, de L'Elevage et de L'Hydraulique (MAEH). 2017. National Plan for Agricultural Investment and Food Nutrition Security. Lome: Ministère de L'Agriculture, de L'Elevage et de L'Hydraulique.
- Ministère del'Agriculture (MA), Ministère de l'Elevage et des Productions Animales (MEPA), Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime (MPAEM) and Ministère de l'Environnement et des Eaux et Forêts (MEEF). 2018. Plan National d'Investissement Agricole et de Sécurité Alimentaire et Nutritionnelle PNIASAN 2018 – 2025. Conakry: Ministère del'Agriculture, Ministère de l'Elevage et des Productions Animales, Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime and Ministère de l'Environnement et des Eaux et Forêts.
- Ministry of Agriculture. September 2010. Liberia Agricultural Sector Investment Programme (LASIP) Report. Monrovia: Comprehensive Africa Agriculture Development Programme.
 Ministry of Agriculture. 20178b. Liberian Agriculture Sector Investment Plan (LASIP II) (2018 – 2022) Final Draft September 2018. Monrovia: Republic of Liberia, Ministry of Agriculture.
- Ministry of Agriculture. 2018a. Liberian Agriculture Sector Investment Plan (LASIP II) (2018 2022) Draft May 2018. Monrovia: Republic of Liberia, Ministry of Agriculture.
- Ministry of Agricultural and Food Security. 2010. The Agricultural Sector Wide Approach: Malawi's Prioritized and Harmonized Agricultural Development Agenda. Lilongwe: Republic of Malawi.
- Présidence de la République (PR). 2016. Plan D'Action 2016-2020 de L'Initiative 3N, Les Nigériens Nourrissent les Nigériens. Niamey: Présidence de la république.
- République de Côte d'Ivoire (RCI). 2010. Programme National D'investissement Agricole (PNIA 2010 2015). Yamoussoukro: République de Côte d'Ivoire.
- République de Côte d'Ivoire (RCI). 2017. Programme National D'investissement Agricole de Deuxieme Generation (2017 2025). Yamoussoukro: République de Côte d'Ivoire.
- Secretariat Executif (SE). 2010. Plan D'Investissement PNIA/SDR Niger. Naimey: Secretariat Executif.
- Secrétariat Permanent de la Coordination de la Politique sectorielle Agricole (SPCPA). 2017. Deuxième Programme National du Secteur Rural (PNSR). Ouagadougou: Secrétariat permanent de la coordination de la politique sectorielle agricole.
- The African Observatory of Science, Technology and Innovation. 2013. Monitoring of Africa's Progress in Research and Experimental Development (R&D) Investments: ASTII Policy Brief Series. Addis Ababa: AU.

- UN. 1995. Beijing Declaration and Platform for Action. The Fourth World Conference on Women, 4 to 15 September 1995. Beijing.
- United Nations Department of Economic and Social Affairs. 2015. Addis Ababa Action Agenda of the Third International Conference on Financing for Development. New York: United Nations Department of Economic and Social Affairs.
- United Nations Economic Commission for Africa (UNECA). 2017. Integrating Agenda 2063 and 2030 Agenda for Sustainable Development into National Development Plans: Emerging Issues for African Least Developed Countries. Addis Ababa: UN Economic Commission for Africa.
- United Nations General Assembly (UNGA). 2015. Resolution Adopted by the General Assembly on 25 September 2015: Transforming Our World, The 2030 Agenda for Sustainable Development. New York: UNGA.
- United Nations General Assembly (UNGA). 2018. Global Indicator Framework for the Sustainable Development Goals. New York: UNGA.

World Health Organization. 2014. Global Nutrition Targets 2025. Geneva: WHO.

APPENDIX A: POTENTIAL FOOD SECURITY AND NUTRITION INDICATORS DRAWN FROM AVAILABLE DATA

Country:	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea Bissau	Liberia	Malawi	Niger	Nigeria	Togo	References
			IPC	acute m	alnutritic	on level					
IPC level 3	1.10%	0.20%	4%	1%	9.00%	2%	46%	1.10%	10.80%	0.90%	Food Security Information Network (FSIN), 2017. <i>Global Report on Food Crisis,</i> Rome: Food and Agriculture Organisation.
IPC level 2	16.30 %	10.00 %	5%	16%	22%	18%		16.30 %	20.30%		Food Security Information Network (FSIN), 2017. <i>Global</i> <i>Report on Food Crisis</i> , Rome: Food and Agriculture Organisation.
IPC level 1											
		Nur	nbers of j	people ir	n need of	f food as	sistance			-	
IPC level 5									0.050 million		FAO, 2018. <i>Monitoring food security in countries with conflict situations :A joint FAO/WFP update for the United Nations Security Council,</i> Rome: Food and Agriculture Organization
IPC level 4									8 million		FAO, 2018. Monitoring food security in countries with conflict situations :A joint FAO/WFP update for the United Nations Security Council, Rome: Food and Agriculture Organization
IPC level 3	0.115 Millio n	0.2 million	0.8 million	0.1 million	0.1 million	0.1 million	6.7 million	0.300 million	5.260 million	0.066 million	FAO , 2017. <i>FAO</i> . [Online] Available at: <u>http://www.fao.org/economic/ess/ess-</u> <u>fs/ess-fadata/en/#.W36CuugzbIU</u> [Accessed 23 August 2018].
IPC level 2	1.703 Millio n	1.9 million	0.9 million	1.4 million	0.3 million	0.8 million	2.833 million	1.703 Million	9.832 million	1.140	FAO, 2017. FAO. [Online] Available at: <u>http://www.fao.org/economic/ess/ess-</u> fs/ess-fadata/en/#.W36CuugzbIU [Accessed 23 August 2018].
IPC level 1											

Country:	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea Bissau	Liberia	Malawi	Niger	Nigeria	Togo	References
Proportion of population receiving food assistance		2 million	145,849	136,82 9	173,59 2		5.1 million	500,00 0	800,000		25, 26, 27, 29, 30
Proportion of displaced population relying on food assistance			58 000 (outside)				0.230 million(Fl ood)	0.327 million	1.9 million (internal)		4,5,28,32
Proportion of population that is hungry (consuming less than 2100 kcal equivalents per day)	1.1 millio n (9.8%)	3.7 million (19.8%)	3.5 million (15%)	2.2 million (17%)	0.5 million (26%)	1.9 million (41.3%)	4.5 million (25.4%)	2.2 million (10.6%)	14.3 million(7.7%)	0.8 million (10.7%)	FAO, 2017. FAO. [Online] Available at: <u>http://www.fao.org/economic/ess/ess-fs/ess-fadata/en/#.W36CuugzbIU</u> [Accessed 23 August 2018].
		•	IPC ch	ronic fo	od insecu	urity leve	els				
CFI levels 3 and 4											
CFI level 2											
CFI level 1		F	ood Inse	curity Ex	nerience	Scale (F	FIES)				
		1			Penenet						
Acute hunger and food insecurity	21.60 %	13.20 %	18.40%	36.10 %		63.90 %	56.10%	18.40 %	26.80%	34.40%	FAO, 2016. <i>Methods for estimating comparable rates of food insecurity experienced by adults throughout the world</i> , Rome: FAO.
Chronic food insecurity[2]	49.70 %	36.30 %	53.50%	73.60 %		84.80 %	86.60%	57.60 %	52.70%	65.50%	FAO, 2016. Methods for estimating comparable rates of food insecurity experienced by adults throughout the world, Rome: FAO.

Country:	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea Bissau	Liberia	Malawi	Niger	Nigeria	Togo	References
				Child u	nderweig	ht					
Severe <-3 SD	5%	3%	3%	6%	4%	4%	6%	13%	9%	4%	7,8,9,12,15,16,17,18,20,22
Acute < 2 SD	18%	19%	15%	21%	17%	15%	12%	36%	18%	16%	7,8,9,12,15,16,17,18,20,22
				Child	stunting						
Severe <-3 SD	12%	7%	12%	16%	8%	12%	11%	22%	21%	10%	7,8,9,12,15,16,17,18,20,22
Chronic < 2SD	34%	27%	30%	36%	28%	32%	37%	44%	37%	28%	7,8,9,12,15,16,17,18,20,22
				Child	wasting						
Severe <-3 SD	1%	1%	2%	4%	1%	2%	1%	6%	12%	2%	7,8,9,12,15,16,17,18,20,22
Moderate < 2SD	4%	8%	8%	11%	6%	6%	3%	18%	29%	7%	7,8,9,12,15,16,17,18,20,22
			Cl	nild over	weight (l	BMI)					
Plus2 SD	2%	1%	3%	4%	2%		5%	2%		2%	7,8,9,12,16,17,18,22
				Fem	ale BMI						
(BMI over 25/29.9)		8%	19%	14%		18%	15%			19%	7,12,15,16,17,22
(BMI over 30)		3%	7%	5%		9%	6%			11%	7,12,15,16,17,22
				Mal	e BMI	•					
(BMI over 25/29.9)						8%					Liberia Institute of Statistics and Geo-Information Services (LISGIS), Ministry of Health and Social Welfare [Liberia], National AIDS Control Program [Liberia], and ICF International, 2014. <i>Liberia Demographic and Health Survey</i> 2013, Monrovia, Liberia: Liberia Institute of Statistics and GeoInformation Services (LISGIS) and ICF International.
(BMI over 30)						1%					Liberia Institute of Statistics and Geo-Information Services (LISGIS), Ministry of Health and Social Welfare

Country:	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea Bissau	Liberia	Malawi	Niger	Nigeria	Togo	References
Minimum dietary diversity for women						4.10%					[Liberia], National AIDS Control Program [Liberia], and ICF International, 2014. Liberia Demographic and Health Survey 2013, Monrovia, Liberia: Liberia Institute of Statistics and GeoInformation Services (LISGIS) and ICF International. UNICEF, 2016. UNICEF. [Online] Available at: https://data.unicef.org/topic/nutrition/infant-and- young-child-feeding/ [Accessed 30 September 2017].
Minimum diet adequacy for children ages 6 – 23 months	15.8%	3.0%	4.6%	3.7%		4.1%	7.8%	5.6%	10.2%	12.1%	UNICEF, 2016. UNICEF. [Online] Available at: https://data.unicef.org/topic/nutrition/infant-and- young-child-feeding/ [Accessed 30 September 2017].
				Anemia	in wom	en					
Severe anemia (<7.0 g / dl)	1%	1%	1%	1%			1%	1%		1%	7,8,9,11,12,16,21
Moderate anemia (7.0-9.9 g / dl)	9%	14%	14%	13%			7%	12%		11%	7,8,9,11,12,16,21
Mild anemia (<11.0 g / dl)	32%	34%	40%	36%			25%	33%		36%	7,8,9,11,12,16,21
			Aner	nia in ch	nildren <	5 years					
Severe anemia (<7.0 g / dl)	3%	11%	3%	8%		8%	2%	3%		2%	7,9,11,12,19,21
Moderate anemia (7.0-9.9 g / dl)	29%	59%	46%	45%			34%	43%		42%	7,9,11,12,19,21
Mild anemia (<11.0 g / dl)	26%	18%	25%	24%			27%	27%		25%	7,9,11,12,19,21

Country:	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea Bissau	Liberia	Malawi	Niger	Nigeria	Togo	References
Iron deficiency for women											
Iron deficiency for children < 5 years											
Iodine deficiency among children < 5 years											
Vitamin A deficiency in children, five years							4%		30% (2001)		13,23
Poverty headcount ratio at \$1.90 a day (2011 PPP) (% of											World Bank, 2017. <i>World Bank</i> . [Online] Available at: <u>https://data.worldbank.org</u> [Accessed 25 June 2018].
population)	49.6%	43.7%	28.2%	35.3%	67.1%	38.6%	69.6%	44.5%	53.5%	49.2%	World Bank, 2017. World Bank. [Online]
Gini Index	47.8%	35.3%	41.5%	33.7%	50.7%	33.2%	45.5%	34.3%	43.0%	43.1%	Available at: <u>https://data.worldbank.org</u> [Accessed 25 June 2018].
				Unem	ploymen	t					
	2.65%	6.50%	2.60%	4.50%	6.10%	2.30%	5.95%	0.32%	7.10%	1.86%	International Labor Organisation, 2017. <i>ILO</i> . [Online] Available at: <u>http://www.ilo.org/global/regions/lang</u> <u>en/index.htm</u> [Accessed 29 June 2018].

Country:	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea Bissau	Liberia	Malawi	Niger	Nigeria	Togo	References
The share of youth not in employment, education or training (NEET) (%)	20%		36%	6.20%		14.50 %	16.70%	20.04 %	20.42%	9%	International Labor Organisation, 2017. <i>ILO</i> . [Online] Available at: <u>http://www.ilo.org/global/regions/lang</u> <u>en/index.htm</u> [Accessed 29 June 2018]
Employment-to- population ratio (%)	69.98 %	61.47 %	58.69%	61.49 %		56.25	73.12%	78.56 %	53.22%		International Labor Organisation, 2017. <i>ILO</i> . [Online] Available at: <u>http://www.ilo.org/global/regions/lang</u> <u>en/index.htm</u> [Accessed 29 June 2018].

TABLE FOOTNOTES

- African Union (AU). 2015. Agenda 2063: First ten-year Implementation Plan 2014 2023. Addis Ababa: AU.
- African Union (AU). 2015. Agenda 2063: The Africa we want. Addis Ababa: AU.
- African Union (AU) and NEPAD. undated b. *Country CAADP Implementation Guidelines under the Malabo Declaration*. Addis Ababa: AU/NEPAD.
- African Union (AU). 2018. AU NAIP Toolkit for Malabo Domestication. Addis Ababa: AU. http://resakss.org/node/6515.
- African Union (AU). 2014. Common African Position on the Post-2015 Development Agenda. Addis Ababa: AU. <u>https://sustainabledevelopment.un.org/content/documents/1329africaposition.pdf</u>.
- African Union (AU). 2014. Decisiosn, declarations and resoutions of the Assembly of the African Union. Twenty-third Ordinary Session, 26 - 27 June 2014, Malabo, Equatorial Guinea. Assembly/AU/Dec 517-545 (XXIII). , Addid Ababa: AU.
- African Union (AU). 2003. *The Maputo Declaration on Agriculture and Food Security in Africa*. Second Ordinary Assembly of the African Union, July 2003, Maputo., Addid Ababa: AU.
- African Union. 2018. Inaugural Biennial Review Report of the African Union Commission on the Implementation of the Malabo Declaration on Accelerated Agricultural Growth and Transformation for Shared prosperity and Improved Livelihoods. Assembly Decision (Assembly/AU/2(XXIII)) of June 2014. ASSEMBLY OF THE UNION Thirtieth (30th) Ordinary Session 28th – 29th January 2018 Addis Ababa, Ethiopia, Addis Ababa: African Union.
- AU and NEPAD. undated. AU (African Union) and NEPAD (New Partnership for Africa's Development). The CAADP Results Framework 2015 2025: Going for results and impacts. Addis Ababa and MidRand: AU and NEPAD.
- AU. 2017. Technical Guidelines for preparing country Biennial Review report on progress made for achieving the Malabo Declaration Goals and Targets. Addis Ababa: African Union.
- AUC. 2006. *Abuja Declaration on Fertilizer for the African Green Revolution*. Addis Ababa: African Union Commission.
- AUC. 2014. Science, Technology and Innovation Strategy for Africa 2024. Addis Ababa: African Union Commission.
- CEDEAO, RCI and UA. 2012. Plan D'investissement Detaille Pour la Mise en Œuvre du Programme National D'investissement Agricolecm (2010 - 2015). Yamoussoukro: Communauté Economique des Etats de l'Afrique de l'Ouest, République de Côte d'Ivoire and Union Africaine.
- FAO. 2017. FAO. Accessed August 23, 2018. http://www.fao.org/economic/ess/ess-fs/ess-fadata/en/#.W36CuugzbIU.

- FAO. 2017. "Food and Agriculture Organization of the United Nations." June. Accessed August 20, 2017. <u>https://docs.wfp.org/api/documents/WFP-0000019329/download/</u>.
- FAO. 2016. Methods for estimating comparable rates of food insecurity experienced by adults throughout the world. Rome: FAO. Accessed August 23, 2018. <u>http://www.fao.org/3/c-i4830e.pdf.</u>
- FAO. 2018. Monitoring food security in countries with conflict situations : A joint FAO/WFP update for the United Nations Security Council. Rome: Food and Agriculture Organization. Accessed August 22, 2018. www.fao.org/3/I8386EN/i8386en.pdf.
- FAO. 2016. Movign Forward with Development of the Resilience Index Measurement and Analysis Model (RIMA). Rome: FAO.
- FMARD. 2010. National Agriculture Investment Plan 2011-2014. Abuja: Federal Ministry of Agricultural and Rural Development.
- Food Security Information Network (FSIN). 2017. *Global Report on Food Crisis*. Rome: Food and Agriculture Organisation. Accessed August 30, 2017. <u>http://www.fao.org/3/a-br323e.pdf.</u>
- GM. 2018. National Agricultural Investment Plan. Lilongwe: Republic of Malawi.
- GM. 2017. National Agricultural Ivestment Plan. Lilongwe: Republic of Malawi.
- Hendriks. 2018. "Food policy and nutrition economics in the SDG era." *Agrekon* Forthcoming. doi:DOI: 10.1080/03031853.2018.1479974 .
- Institut National de la Statistique (INS) et ICF International. 2012. Enquête Démographique et de Santé et à Indicateurs Multiples de Côte d'Ivoire 2011-2012. Calverton, Maryland, USA: INS et ICF International. Accessed August 28, 2017. : <u>http://www.dhsprogram.com/pubs/pdf/FR272/FR272.pdf.</u>
- Institut National de la Statistique (INS) et ICF International. 2013. Enquête Démographique et de Santé et à Indicateurs Multiples du Niger 2012. Calverton, Maryland, USA: INS and ICF International. Accessed August 29, 2017. http://dhsprogram.com/pubs/pdf/FR277/FR277.pdf.
- Institut National de la Statistique et de l'Analyse Economique (INSAE). 2015. Enquête par grappes à indicateurs multiples(MICS), 2014, Résultats clés. Cotonou, Bénin: Institut National de la Statistique et de l'Analyse Economique.<u>https://mics-surveysprod.</u> <u>s3.amazonaws.com/MICS5/West%20and%20Central%2</u> <u>0Africa/Benin/2014/Key%20findings/Benin%202014%20MI CS%20KFR_French.pdf</u>.
- Institut National de la Statistique et de l'Analyse Économique (INSAE) et ICF International. 2013. *Enquête Démographique et de Santé du Bénin 2011-2012*. Calverton, Maryland, USA: INSAE et ICF International. <u>http://dhsprogram.com/pubs/pdf/FR270/FR270.pdf</u>.

- Institut National de la Statistique et de la Démographie (INSD) et ICF International. 2012. *Enquête Démographique et de Santé et à Indicateurs Multiples du Burkina Faso 2010.* Calverton, Maryland, USA: INSD et ICF International. Accessed August 28, 2017. <u>http://dhsprogram.com/pubs/pdf/FR256/FR256.pdf</u>.
- Institut National de la Statistique Ministère du Plan. 2013. Enquête Demographique Et De Santé Et À Indicateurs Multiples (Eds-Mics 2012). Conakry: Institut National de la Statistique Ministère du Plan. Accessed August 27, 2017. <u>https://dhsprogram.com/pubs/pdf/FR280/FR280.pdf</u>.
- International Institute of Tropical Agriculture (IITA), USAID, UNICEF, USDA. 2004. Nigeria Food Consumption and Nutrition Survey 2001-2003. Abuja, Nigeria: International Institute of Tropical Agriculture. Accessed September 5, 2017. <u>http://apps.who.int/nutrition/landscape/report.aspx?iso</u> =NGA&rid=1620&goButton=Go.
- International Labor Organisation. 2017. *ILO*. Accessed June 29, 2018. <u>http://www.ilo.org/global/regions/lang--en/index.htm</u>.
- Liberia Institute of Statistics and Geo-Information Services (LISGIS), Ministry of Health and Social Welfare [Liberia], National AIDS Control Program [Liberia], and ICF International. 2014. *Liberia Demographic and Health Survey 2013*. Monrovia, Liberia: Liberia Institute of Statistics and GeoInformation Services (LISGIS) and ICF International. <u>https://dhsprogram.com/pubs/pdf/FR291/FR291.pdf</u>.
- MA. 2018. Liberian Agricultural Sector Investmet Plan. Monrovia: Ministry of Agriculture.
- MA. 2010. Plan D'Investissement Agricole 2010-2015. Conakry: Ministere de L'Agriculture.
- MA. 2012. *Plan National D'investissement Agricole et de Securite Alimentaire 2013-2017*. Conakry: Ministere de L'Agriculture.
- MA, MEPA, MPAEM and MEEF. 2018. Plan National d'Investissement Agricole et de Sécurité Alimentaire et Nutritionnelle PNIASAN 2018 – 2025. Conakry: Ministère de l'Agriculture, Ministère de l'Elevage et des Productions Animales, Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime and Ministère de l'Environnement et des Eaux et Forêts.
- MA, MEPA, MPAEM and MEEF. 2017. *Plan national de sécurité agricole et alimentaire et nutritionnelle*. Conakry: Ministère del'Agriculture, Ministère de l'Elevage et des Productions Animales, Ministère de la Pêche, de l'Aquaculture et de l'Economie Maritime and Ministère de l'Environnement et des Eaux et Forêts.
- MADR and CPA. 2013. programme national d'investissement agricole. Bissau: Ministere De
 L agriculture Et Du Developpement Rural and Cabinet De Planification
 AgricoleMinistere de L Agriculture et du Developpement Rural and Cabinet de
 Planification Agricole.

- MAEH. 2017. National Plan for Agricultural Investment and Food Nutrition Security. Lome: Ministère de L'Agriculture, de L'Elevage et de L'Hydraulique.
- MAEP and MEF. 2010. *Plan d'Investissement Agricole 2010 2015*. Porto Novo: Ministere de L'Agriculture, de L'elevage et de la Peche and Ministere de L'economie et des Finances.
- MAEP. 2017. Plan stratégique pour le développement du secteur agricole (PSDSA): 2025 Orientations stratégiques. Porto-Novo: Ministère de l'agriculture, de l'élevage et de la pêche.
- MAEP. 2010. Programme National D'Investissement Agricole et de Securite Alimentaire. Lome: ministère de l'agriculture, de l'élevage et de la pêche.
- MAH, MEDD and MRA. 2012. PROGRAMME NATIONAL DU SECTEUR RURAL. Ougadougou: Ministère de l'agriculture et de l'hydraulique, Ministère de l'environnement et du développement durable and Ministère des ressources animales.
- Malabo Montpellier Panel. 2018. Mechanised: Transforming African's Agricultural Value Chains. Dakar: Malabo Montpellier Panel.
- Malabo Montpellier Panel. 2017. Nourished: How Africa can build a future free form hunger and malnutrition. Dakar: Malabo Montpellier Panel.
- Ministère de la Planification, du Développement et de l'Aménagement du Territoire (MPDAT), Ministère de la Santé (MS) et ICF International. 2015. Enquête Démographique et de Santé au Togo 2013-2014. Rockville, Maryland, USA: MPDAT, MS et ICF International. Accessed August 31, 2017. <u>https://dhsprogram.com/pubs/pdf/FR301/FR301.pdf</u>.
- Ministere de la Sante. 2016. "Enquête Nutritionnelle Nationale 2016." Ouagadougou. Accessed August 28, 2017. <u>https://www.humanitarianresponse.info/system/files/documents/files/smart_2016.pdf</u>
- Ministério da Economia e Finanças, Direcção Geral do Plano Instituto Nacional de Estatística (INE). 2015. *Inquérito aosIndicadores Múltiplos (MICS) 2014, Principais Resultados*. Bissau, Guinea-Bissau: Ministério da Economia e Finanças, Direcção Geral do Plano Instituto Nacional de Estatística (INE). Accessed August 29, 2017. <u>https://mics surveysprod.s3.amazonaws.com/MICS5/West%20and%20Central%20Africa/Guinea-Bissau/2014/Key%20findings/Guinea-Bissau%202014%20MICS%20KFR_Portuguese.pdf.
 </u>
- Ministry of Agricultural and Food Security. 2010. The Agricultural Sector Wide Approach: Malawi's prioritized and harmonized Agricultural Development Agenda. Lilongwe: Republic of Malawi.
- Ministry of Agriculture. 2010a. *Liberia Agricultural Sector Investment Programme (LASIP)* Report. Monrovia: Comprehensive Africa Agriculture Development Programme.
- Ministry of Agriculture. 2010b. *Liberia Agricultural Sector Investment Programme (LASIP) Report.* Monrovia: Comprehensive Africa Agriculture Development Programme.

- National Malaria Control Program (NMCP) [Liberia], Ministry of Health and Social Welfare (MOHSW), Liberia Institute of Statistics and Geo- Information Services (LISGIS), and ICF International. 2012. Liberia Malaria Indicator Survey 2011. Monrovia, Liberia: NMCP, LISGIS, and ICF International. <u>https://dhsprogram.com/pubs/pdf/MIS12/MIS12.pdf</u>.
- National Population Commission (NPC) [Nigeria] and ICF International. 2014. *Nigeria Demographic and Health Survey 2013*. Abuja, Nigeria, and Rockville, Maryland, USA: NPC and ICF International. Accessed August 31, 2017. <u>https://dhsprogram.com/pubs/pdf/FR293/FR293.pdf</u>.
- National Statistical Office (NSO) [Malawi] and ICF. 2017. *Malawi Demographic and Health Survey* 2015-16. Zomba, Malawi, and Rockville, Maryland, USA: NSO and ICF. Accessed July 31, 2018. <u>https://dhsprogram.com/pubs/pdf/FR319/FR319.pdf.</u>
- National Statistical Office (NSO) and ICF Macro. 2011. *Malawi Demographic and Health Survey* 2010. Zomba, Malawi, and Calverton, Maryland, USA: NSO and ICF Macro. Accessed August 31, 2017. <u>https://dhsprogram.com/pubs/pdf/FR247/FR247.pdf</u>.
- National Statistical Office (NSO), Community Health Sciences Unit (CHSU) [Malawi], Centers for Disease Control and Prevention (CDC), and Emory University. 2016. *Malawi Micronutrient Survey 2015-16: Key Indicators Report*. Atlanta, GA, USA: NSO, CHSU, CDC and Emory University. Accessed September 5, 2017. <u>https://dhsprogram.com/pubs/pdf/FR319/FR319m.pdf</u>.
- PR. 2016. Plan D'Action 2016-2020 de L'Initiative 3N, Les Nigériens Nourrissent les Nigériens. Niamey: Présidence de la république.
- RCI. 2010. Programme National D'investissement Agricole (PNIA 2010 2015). Yamoussoukro: République de Côte d'Ivoire.
- RCI. 2017. Programme National D'investissement Agricole de Deuxieme Generation (2017 2025). Yamoussoukro: République de Côte d'Ivoire.
- SE. 2010. Plan D'Investissement PNLA/SDR Niger. Naimey: Secretariat Executif.
- UN General Assembly (UNGA). 2018. *Global indicator framework for the Sustainable Development Goals*. A/RES/71/313 E/CN/2018/2, New York: UNGA. Accessed July 28, 2018. <u>https://unstats.un.org/sdgs/indicators/Global%20Indicator%20Framework%20after%</u> <u>20refinement_Eng.pdf</u>.
- UNECA. 2017. Integratoing Agenda 2063 and 2030 Agenda for Sustainable Development into national development plans: Emerging issues for African Least Developed Countries. Addis Ababa: UN Economic Commission for Africa.
- UNICEF. 2016. UNICEF. Accessed September 30, 2017. https://data.unicef.org/topic/nutrition/infant-and-young-child-feeding/.
- United Nations Department of Economic and Social Affairs. 2015. *Addis Ababa Action Agenda of the third International Conference on Financing for Development*. New York: United Nations Department of Economic and Social Affairs.

- United Nations General Assembly (UNGA). 2015. Resolution adopted by the General Assembly on 25 September 2015: Transforming our world: the 2030 Agenda for. Seventieth session, Agenda items 15 and 116, New York: UNGA. Accessed July 29, 2017. http://www.un.org/ga/search/view_doc.asp?symbol=A/RES/70/1&Lang=E.
- USAID. 2017a. "USAID." December. Accessed June 25, 2018. <u>https://www.usaid.gov/sites/default/files/documents/1866/Malawi FFP FS 2017.12.</u> <u>07.pdf</u>.
- —. 2018b. "USAID." 7 June. Accessed June 25, 2018. <u>https://www.usaid.gov/sites/default/files/documents/1866/FFP_Fact_Sheet_Nigeria_06.07.18.pdf</u>.
- —. 2018a. "USAID." January. Accessed June 25, 2018. : <u>https://www.usaid.gov/sites/default/files/documents/1866/FFP_Fact_Sheet_Niger_0_4.12.18.pdf</u>.
- WFP. 2015. "Global Food Security Update. Trackiong Food Security in Vulnerable Countries."
- —. 2018. "World Food Programme." April. Accessed June 25, 2018. <u>https://docs.wfp.org/api/documents/a88e61ff988e4bcdbf3910b6e2f639af/download/?</u> <u>ga=2.60740589.1518885718.1529913905-430138566.1522143641</u>.
- World Bank. 2017. World Bank. Accessed June 25, 2018. https://data.worldbank.org.
- World Food Programme (WFP). 2013. 2012 Food Aid Flows. International Food Aid Information System. Accessed August 18, 2018. <u>http://documents.wfp.org/stellent/groups/public/documents/newsroom/wfp262299.</u> pdf?_ga=2.183047462.1271536600.1505467140-2062529251.1504025691.
- World Health Organization. 2014. Global Nutrition Targets 2025. Policy brief WHO/NMH/NHD/14.2, Geneva: WHO. Accessed December 21, 2017. http://www.who.int/nutrition/publications/globaltargets2025_policybrief_overview/en /.

APPENDIX B: SUMM	IARY OF OUTPUTS
-------------------------	-----------------

Relevant SDG Indicators		Relevant Age (First 10-year		Identified BR Indicators					Number of associated NAIP indicators										
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total		
					1.1 Country CAADP Process	1.1 CAADP Process Completion Index	0	0	0	0	0	0	0	0	0	0	0		
				1. Commit ment to CAADP Process	1.2 CAADP based Cooperati on, Partnersh ip & Alliance	1.2- Existence of, and quality of multi- sectorial and multistakeh older coordinatio n body.	0	4	2	0	4	1	3	1 3	0	7	3 4		
					1.3 CAADP based Policy & Institutio nal Review/	1.3- Evidence- based policies, supportive institutions and	0	3	0	0	7	1	0	1 4	0	8	3 3		

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	Identified BR Indicators					Number of associated NAIP indicators										
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total			
					Setting/ Support	correspondi ng human resources										•				
1.1 By 2030, eradicate extreme poverty for all people everywhe re, currently measured	1.1.1 Proportion of population below the international poverty line, by sex, age, employment status and	1.1.2 Poverty, inequality and hunger	1.1.2.1 Reduce the 2013 levels of poverty by at least 30%	4. Eradicati ng poverty through agricultu re	4.1 Agricultur al GDP and Poverty Reductio n	4.1ii- Agriculture contributio n to the overall poverty reduction target	0	2	2	1	1	2	2	2	1	0	1 3			
measured as people living on less than \$1.25 a day	geographical location (urban/rural)	1.1.2 Poverty, inequality and hunger	1.1.2.2 Reduce poverty amongst women by at least 50%			4.1iv- Reduction rate of poverty headcount ratio at internationa l poverty	0	0	1	0	0	0	1	1	0	0	3			

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	Identified BR Indicators				Number of associated NAIP indicators										
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total		
						line (% of population)													
	1.2.1 Proportion of population living below the national poverty line, by sex and age			4.Eradica ting Poverty through Agricultu re	4.1 Agricultur al GDP and Poverty Reductio n	4.1iii- Reduction rate of poverty headcount ratio, at national poverty line (% of population)	1	2	4	1	0	0	2	2	0	1	1 3		
1.3 Impleme nt nationally appropria te social protectio n systems and measures for all, including floors	1.3.1 Proportion of population covered by social protection floors/systems, by sex, distinguishing children, unemployed persons, older persons, persons with disabilities, pregnant	1.1.3 Social security and protection including persons with disabilities	1.1.3.1 At least 30% of vulnerable populations including persons with disabilities, older persons and children provided with social protection.	3. Ending Hunger	3.4 Social Protectio n	3.4- Budget lines (%) on social protection as a percentage of the total resource requiremen ts for coverage of the vulnerable	0	0	2	1	1	0	0	9	0	1	1 4		

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mber	f of a	ISSOC	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
and 2030 achieve substantia l coverage of the poor and vulnerabl e	women, newborns, work-injury victims and the poor and the vulnerable					social groups	I	I	0	0)	I	L	L	4		
1.4 By 2030, ensure that all men and women, in particular, the poor and the vulnerabl e, have equal rights to economic resources,	1.4.1 Proportion of population living in households with access to basic services	1.1.4 Modern and livable habits and basic quality services	1.1.4.9 At least 70% of the population indicate an increase in access to quality basic services (water, sanitation, electricity, transportatio n, internet connectivity)	8. Additi onal Indicator s	8.Additio nal Indicators	8.7 Impact on the quality of life	0	1	2	0	0	0	0	1	0	0	3 4

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	f of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
as well as access to basic services, ownershi p and control over land and other				2. Investme nt finance in agricultu re	2.4 Access to finance	2.4 Proportion of men and women engaged in agriculture with access to financial services	1	0	3	1	1	2	1	1	6	6	2 2
forms of property, inheritanc e, natural resources, appropria te new				3. Ending hunger	3.1 Access to agricultur e inputs and technolog ies	3.1vii Access to technologie s and equipment	1	3	3	1	3	5	0	1 3	0	5	3 4
technolog y and financial services, including microfina nce	1.4.2 Proportion of total adult population with secure tenure rights to land, with legally recognised documentation and who	6.17.1 Women Empowerm ent	6.17.1.2 At least 20% of rural women have access to and control productive assets, including	3. Ending hunger	3.1 Access to agricultur e inputs and technolog ies	3.1vi- Proportion of farm households with ownership or secure land rights	0	2	2	0	1	0	1	0	1	5	12

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	rs	Nu	mbe	r of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
	perceive their rights to land as secure, by sex and by type of tenure		land and grants, credit, inputs, financial service and information				I	I))	0		I	4			
1.5 By 2030, build the resilience of the poor and those in vulnerabl e situations and reduce their exposure and vulnerabil ity to climate- related	1.5.1 Number of deaths, missing persons and persons affected by disaster per 100,000 people	1.7.3 Climate resilience and natural disasters	1.7.3. 3Reduce death and property loss from natural and human- made disasters and extreme climate events by at least 30%	8. Addition al Indicator s	8. Additiona 1 Indicators	8.5 Beneficiary identificatio n- specifically vulnerable group	0	1	0	0	0	0	0	0	0	0	1

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
extreme events and other economic , social and environm ental shocks and disasters																	
2.1 By 2030, end hunger and ensure access by all people, in particular, the poor and	2.1.1 Prevalence of undernourishme nt	1.1.2 Poverty, inequality and hunger	1.1.2.4 Reduce the 2013 levels of the proportion of the population who suffers from hunger by at least 70%	3. Ending hunger	3.5 Food security and nutrition	3.5iv- Proportion of the population that is undernouris hed (% of the country's population)	0	1	1	0	1	1	0	1	1	0	6

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	rs	Nu	mber	of a	ssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
people in vulnerabl e situations, including infants, to safe, nutritious and sufficient food all year round		1.1.5Agricul tural productivit y and production	1.1.5.9 End Hunger in Africa														
2.2 By 2030, end-all forms of malnutriti on, including achieving, by 2025, the internatio	2.2.1 Prevalence of stunting (height for age <-2 standard deviation from the median of the World Health Organization (WHO) Child Growth	1.3.1 Health and Nutrition1.1.2 Poverty, inequality and hunger	1.3.1.8 Reduce stunting to 10% 1.1.2.5 Reduce stunting in children to 10% and underweight by 5%			3.5i- Prevalence of stunting (% of children under 5 years old)	1	0	0	1	0	2	1	3	1	0	9

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	°S	Nu	mbe	r of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
nally agreed targets on stunting and wasting in children under five years of age, and	Standards) among children under five years of age	1.5.1Agricul tural productivit y and production	1.5.1.10Elim ination of Child under nutrition with a view to bring down stunting to 10% and underweight to 5%			3.5ii- Prevalence of underweigh t (% of children under 5 years old)	0	0	0	1	0	2	1	1	0	0	5
address the nutritiona l needs of adolescen t girls, pregnant and lactating women and older persons	2.2.2 Prevalence of malnutrition (weight for height >+2 or <-2 standard deviation from the median of the WHO Child Growth Standards) among children under five years of age, by type (wasting and overweight)	1.3.1 Health and Nutrition	1.3.1.7 Reduce 2013 proportion of malnutrition by at least 50%			3.5iii- Prevalence of wasting (% of children under 5 old)	0	0	0	1	0	3	0	1	0	0	5

Relevant SDG Indicators		Relevant Age (First 10-year		Perform ance Theme Sub- theme Indicator 3.5v- Growth rate of the proportion of Minimum Dietary 					c of a	issoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	ance		Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
						Growth rate of the proportion of Minimum Dietary Diversity-	1	0	1	1	0	0	1	0	0	0	4
				1		Proportion	0	0	0	0	0	0	1	0	0	0	1
						3.5viii Prevalence of anaemia in women of childbearin	0	0	0	0	0	0	0	1	0	0	1

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mber	of a	assoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
						g age (15 to 49 years) (%)											
						3.5ix Prevalence of anaemia in children (%)	0	0	0	0	0	0	0	1	0	0	1
						3.5xii Number of fortification initiatives	0	0	0	0	0	0	0	0	1	2	3
						3.5.xiii Quantity of biofortified foods produced	0	0	0	0	0	0	0	0	0	2	2
						3.5x Strengtheni ng nutrition specific and nutrition sensitive actions	0	0	0	0	0	0	0	2	0	0	2

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	"S	Nu	mbe	c of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Iogo	Total
						3.5xiv Number of nutrition rehabilitatio n centers	0	0	0	0	0	0	0	0	3	0	3
						3.5xv Exclusive Breastfeedi ng rate	0	0	0	0	0	0	0	0	1	0	1
2.3 By 2030, double the agricultur al productiv ity and incomes of small- scale food producers , in	2.3.1 Volume of production per labour unit by classes of farming/pastora l/forestry enterprise siz	1.5.1	1.5.1.2	3. Ending	3.2 Agricultur al	3.2i- Growth rate of agriculture value added, in constant US dollars, per agricultural worker	0	0	2	0	0	0	0	0	0	0	2
particular women, indigenou		Agricultural productivit	1.5.1.2 Double agricultural	hunger	al Productiv ity	3.2ii- Growth rate of	1	1	1	0	3	1	2	2	2	0	1 3

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	75	Nu	mber	r of a	ssoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
s peoples, family farmers, pastoralis ts and fishers, including through secure		y and production	total factor productivity			agriculture value added, in constant US dollar, per hectare of agricultural arable land											
and equal access to land, other productiv e resources and inputs, knowledg e, financial services, markets and				3. Ending hunger	3.2 Agricultur al productiv ity	3.2iii- Growth rate of yields for the 5 national priority commoditie s, and possibly for the 11 AU agriculture priority commoditie s	3	8	4	2	1 7	2	2	6	0	0	4 4

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	"S	Nu	mber	c of a	issoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
opportuni ties for value addition and non- farm employm ent	2.3.2 Average income of small- scale food producers, by sex and indigenous statu	1.5.1 Agricultural productivit y and production	1.5.1.6 At least 10% of Agricultural GDP is produced by commercial farmers 1.5.1.7 At least 10% of small-scale farmers graduate into small-scale commercial farming and those graduating at least 30% should be women.	8. Addition al indicator s	8. Additiona 1 indicators	8.3 Commercia lisation	0	2	1	0	3	0	1	7	0	8	2 2
2.4 By 2030, ensure sustainabl e food	2.4.1 Proportion of agricultural area under productive and	1.7.1 Bio- diversity, conservatio n and	1.7.1.1 At least 30% of agricultural land is placed under	6. Resilienc e to climate	6.1 Resilience to climate-	6.1ii- Share of agricultural land under sustainable	1	1 2	2	1	8	3	2	1 8	0	3	5 0

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	75	Nu	mbe	r of a	lssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
productio n systems and implemen t resilient	sustainable agriculture	sustainable natural resource managemen t.	sustainable land management practice	variabilit y	related risks	land managemen t practices										•	<u> </u>
agricultur al practices that increase productiv ity and productio n, that help maintain ecosyste ms, that strengthe n capacity for adaptatio n to climate change, extreme		1.5.1 Agricultural productivit y and production	1.5.1.5 Increase the proportion of farm, pastoral and fisher households are resilient to climate and weather related risks to 30%	3. Ending hunger	3.5 Food security and nutrition	3.5xi Reduction in number of people requiring food assistance	0	0	0	0	0	0	1	0	0	0	1

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	c of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
weather, drought, flooding and other disasters and that progressi vely improve land and soil quality																	
2.a Increase investme nt, including through	2.6.2 Total official flows (official development assistance plus other official	1.5.1 Agricultural productivit y and production	1.5.1.1Alloca te a minimum of 10% annual public	2. Investme nt Finance in	2.1 Public Expendit ures to Agricultur e	2.1i- Public agriculture expenditure as share of total public expenditure	3	3	1	1	1 0	0	0	3	1	5	2 7

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mber	f of a	issoc	iated	l NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
enhanced internatio nal cooperati on, in rural infrastruc ture, agricultur	flows) to the agriculture sector		expenditure to agriculture and grow the sector by at least 6% per annum	Agricultu re		2.1.ii- Public Agriculture Expenditur e as % of agriculture value added	0	0	1	0	0	0	0	0	0	0	1
al research and extension services, technolog y		7.20.3 Developme nt Assistance	7.20.3.1 Proportion of aid in the national budget is at most 30% of 2013 level	2. Investme		2.1iii- ODA disbursed to agriculture as % of commitmen t (ODA).	0	1	0	0	0	0	0	0	0	3	4
developm ent and plant and livestock gene banks in order to enhance				nt Finance in Agricultu re	2.2 Domestic Private Sector Investme nt in Agricultur e.	2.2- Ratio of domestic private sector investment to public investment in agriculture	2	0	4	1	0	0	1	0	1	0	9

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	75	Nu	mbe	r of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
agricultur al productiv e capacity in developin g countries, in particular least develope d countries					2.3 Foreign Private Sector Investme nt in Agricultur e.	2.3- Ratio of foreign private direct investment to public investment in agriculture	2	0	4	1	0	0	1	0	1	0	9
				3. Ending hunger	3.1 Access to agricultur e inputs and technolog	3.1i- Fertilizer consumptio n (kilogram of nutrients per hectare of arable land)	0	0	0	0	3	0	1	4	1	0	9
		1.7.2 Water Security	1.7.2.1 Increase 2013 levels		ies	3.1ii- Growth rate of the	0	8	1	0	4	0	2	2 0	3	1	3 9

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	cs	Nu	mber	of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
			of water demand satisfaction by 25% 1.7.2.2 Increase 2013 levels of water productivity from rain- fed agriculture and irrigation by 60%			size of irrigated areas from its value of the year 2000			-		-						
						3.1iii- Growth rate of the ratio of supplied quality agriculture inputs (seed, breed,	0	6	1	0	8	0	1	2 3	1	4	4 4

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	c of a	ISSOC	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
						fingerlings) to the total national inputs requiremen ts for the commodity											
						3.1iv- Proportion of farmers having access to Agricultural Advisory Services	0	1	1	0	4	4	1	1 2	1	1 2	3 6
				8.Additio nal infrastru cture	8. Additiona 1 infrastruc ture	8.1 Infrastructu re developme nt	0	3	1	0	4	2	0	3 4	0	5	4 9
2.c Adopt measures to ensure the proper	2.8.1 Indicator of food price anomalies			4. Eradicati ng poverty through	4.1 Agricultur al GDP and	4.1v Reduction rate of the gap between	0	0	0	0	3	0	0	0	0	0	3

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mber	of a	ssoci	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
functioni ng of food commodi ty markets and their derivative s and facilitate timely access to market informati on, including on food reserves, in order to help limit extreme food price volatility				agricultu re	poverty reduction	the wholesale price and farm gate price											

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	75	Nu	mbe	r of a	issoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
5.a Undertak e reforms to give women equal rights to economic resources, as well as access to ownershi p and control over land and other forms of property, financial services,	5.7.1 (a) Proportion of total agricultural population with ownership or secure rights over agricultural land, by sex; and (b) share of women among owners or rights-bearers of agricultural land, by type of tenure	6.17.1 Women's empowerm ent	6.17.1.1 Equal economic rights for women, including the rights to own and inherit property, sign a contract, save, register and manage a business and own and operate a bank account by 2025	4. Eradicati ng poverty through agricultu re	4.4 Women's participati on in agri- business	4.4- Proportion of rural women that are empowered in agriculture	1	0	1	2	0	0	0	0	1	0	5

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mber	of a	ssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
inheritanc e and natural resources, in accordanc e with national laws	5.7.2 Proportion of countries where the legal framework (including customary law) guarantees women's equal rights to land ownership and/or control		6.17.1.2 At least 20% of rural women have access to and control productive assets, including land and grants, credit, inputs														
6.1 By 2030, achieve universal and equitable access to safe and affordabl e drinking water for all	6.1.1 Proportion of population using safely managed drinking water services	1.1.4 Modern and livable habits and basic quality services	1.1.4.2 Reduce 2013 level of the proportion of the population without access to safe drinking water by 95%	8. Addition al indicator s	8. Additiona 1 indicators	8.9 Water, sanitation and health (WASH)	0	1 6	0	0	0	0	0	2	0	0	1 8

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	rs	Nu	mber	of a	ssoci	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
6.2 By 2030, achieve access to adequate and equitable sanitation and hygiene for all and end open defecatio n, paying special attention to the needs of women and girls and those in vulnerabl e situations	6.2.1 Proportion of population using safely managed sanitation services, including a hand-washing facility with soap and water	1.1.4 Modern and livable habits and basic quality services	1.1.4.3 Reduce the 2013 level of the proportion of the population without improves sanitation facility by 95%						-	-							

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	ISSOC	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
6.b Support and strengthe n the participati on of local communi ties in improvin g water and sanitation managem ent	6.b.1 Proportion of local administrative units with established and operational policies and procedures for participation of local communities in water and sanitation management			8. Addition al Indicator s	8. Additiona 1 Indicators	8.10 Recov ery of services (water base)	0	1	0	0	0	0	0	0	0	0	1
7.2 By 2030, increase substantia lly the share of renewable energy in the global	7.2.1 Renewable energy share in the total final energy consumption	1.7.4 Renewable Energy	1.7.4.1 Raise the share of renewable energy (wind, solar, hydro, bio and geothermal) in total energy	8. Addition al indicator s	8. Additiona 1 indicators	8.4 Energy	0	0	0	0	0	0	0	0	0	1	1

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
energy mix			production by at least 10%														
8.1 Sustain per capita economic growth in accordanc e with national circumsta nces and, in particular, at least 7 per cent gross domestic product growth per annum in the least develope	8.1.1 Annual growth rate of real GDP per capita	1.4.1 Sustainable inclusive economic growth	1.4.1.1 Annual GDP growth rate of at least 7%	4. Eradicati ng poverty through agricultu re	4.1 Agricultur al GDP and poverty reduction	4.1i- Growth rate of the agriculture value added, in constant US dollars	8	8	5	2	1 1	4	1	1 0	2	0	5 1

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	ssoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
d countries																	
8.2 Achieve higher levels of economic productiv ity through diversifica tion, technolog ical upgrading and innovatio n, including through a focus on high- value- added and labour-	8.2.1 Annual growth rate of real GDP per employed person	1.4.3 Economic diversificati on and resilience	1.4.3.1Impro vement in diversificatio n index of 2013 is at least 20%	8. Addition al indicator s	8. Additiona l indicators	8.6 Diversificat ion	0	1	0	0	0	0	0	1	0	1	3

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
intensive sectors																	
8.5 By 2030, achieve full and productiv e employm ent and decent work for all women and men, including for young people and persons with disabilitie s, and equal pay for work	8.5.2 Unemployment rate, by sex, age and persons with disabilities	 1.5.1 Agricultural productivit y and production 6.18.1 Youth Empowerm ent and Children's Rights 	1.5.1.3 Increase youth and women participation in integrated agricultural value chains by at least 30% 6.18.1.1 Reduce the 2013 rate of youth unemployme nt by at least 25%; in particular, female youth	4. Eradicati ng Poverty through agricultu re	4.3 Youth jobs in agricultur e	4.3- Percentage of youth that is engaged in new job opportuniti es in agriculture value chains	1	2	4	2	3	0	0	1	3	0	1 6

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	°S	Nu	mbe	r of a	lssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
of equal value																	
9.5 Enhance scientific research, upgrade the technolog ical capabilitie s of industrial sectors in all countries, in particular developin g countries, including, by 2030, encouragi	9.5.1 Research and development expenditure as a proportion of GDP	1.4.3 Economic diversificati on and resilience 1.4.2 STI driven Manufactur ing / Industrializ ation and Value Addition	1.4.3.6 At least 1% of GDP is allocated to science, technology and innovation research and STI driven entrepreneur ship development 1.4.2.5 Gross Domestic Expenditure s on R&D (GERD) as a	3. Ending hunger	3.1 Access to agricultur e inputs and technolog ies	3.1v- Total agricultural research spending as a share of AgGDP	1	0	0	1	1	2	0	0	3	0	8

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	"S	Nu	mber	of a	ssoci	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
ng innovatio n and substantia lly increasing the number of research and developm ent workers per 1 million people and public and private research and developm ent spending			percentage of GDP has reached 1% by 2023														

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	rs	Nu	mbe	r of a	.ssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
12.1 Impleme nt the 10- Year Framewo rk of program mes on sustainabl e consumpt ion and productio n patterns, all countries taking action, with develope d countries taking the lead, taking	12.1.1 Number of countries with sustainable consumption and production (SCP) national action plans or SCP mainstreamed as a priority or a target into national policies			3. Ending hunger	3.5 Food security and nutrition	3.5vii Number of nutrition education communica tion and behaviour change themes in the region	1	1	0	1	1	1	1	3	0	0	9

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbei	f of a	ssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
into account the developm ent and capabilitie s of developin g countries																	
12.3 By 2030, halve per capita global food waste at the retail and consumer levels and reduce food losses along productio	12.3.1 Global food loss index	1.5.1 Agricultural productivit y and production	1.5.1.4 Reduce post-harvest loss by 50%	3. Ending hunger	3.3 Post- harvest losses	3.3- Reduction rate of post- harvest Losses for (at least) the five national priority commoditie s, and possibly for the 11 AU agriculture priority	1	0	3	1	1	1	5	5	1	1	1 9

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	ssoc	iated	NA	[P in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
n and supply chains, including post- harvest losses						commoditie s					v						
13.1 Strengthe n resilience and adaptive capacity to climate- related hazards and natural disasters in all countries	13.1.2 Number of deaths, missing persons and persons affected by disaster per 100,000 people	1.7.3 Climate Resilience and Natural Disasters and preparedne ss	1.7.3.3 Reduce death and property loss from natural and human- made disasters and extreme climate events by at least 30% 1.7.3.1 At least 30% of farmers, pastoralist and fisher folks	6. Resilienc e to climate variabilit y	6.2 Investme nt in resilience building	6.2i Number of households affected by climate- related shocks	0	0	0	0	0	0	0	2	0	2	4

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbe	r of a	lssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
			practice climate resilient production systems														
		1.5.1 Agricultural productivit y and production	1.5.1.5 Increase the proportion of farm, pastoral and fisher households are resilient to climate and		6.1 Resilience to climate related risks	6.1i- Percentage of farm, pastoral, and fisher households that are resilient to climate and weather related shocks	0	5	1	0	1	2	1	3	0	1	1 4
13.2 Integrate climate change measures	13.2.1 Number of countries that have communicated the		weather related risks to 30%		6.2 Investme nt in resilience building	6.2- Existence of government budget-	2	3	2	0	3	0	0	1 0	0	3	2 3

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	75	Nu	mber	r of a	ISSOC	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
into national policies, strategies and planning	establishment or operationalizatio n of an integrated policy/strategy/ plan which increases their ability to adapt to the adverse impacts of climate change, and foster climate resilience and low greenhouse gas emissions development in a manner that does not threaten food production	1.7.3 Climate Resilience and Natural Disasters and preparedne ss	1.7.3.1 At least 30% of farmers, pastoralist and fisher folks practice climate resilient production systems			lines to respond to spending needs on resilience building initiatives											
	13.3.2 Number of countries that have communicated the			7. Mutual Account ability for	7.1 Country capacity for evidence	7.1- Index of capacity to generate and use agriculture	1	2	1	1	2	1	1	3	0	6	1 8

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	S	Nu	mbe	c of a	issoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
	strengthening of institutional, systemic and individual capacity- building to implement adaptation, mitigation and technology transfer, and development actions			Actions and Results	based planning, implemen tation and M&E	statistical data and information (ASCI)											
15.1 By 2020, ensure the conservat ion, restoratio n and sustainabl e use of	15.1.1 Forest area as a proportion of the total land area	1.7.1 Bio- diversity, conservatio n and sustainable natural resource managemen t.	1.7.1.1 At least 30% of agricultural land is placed under sustainable land management practice	6. Resilienc e to climate variabilit y	6.1 Resilience to climate related risks	6.1ii- Share of agricultural land under sustainable land managemen t practices (SSLM)	0	1	1	1	2	0	0	0	0	0	5
terrestrial and inland	15.1.2 Proportion of	ι.	1.7.1.2 At least 17% of	6. Resilienc	6.1 Resilience	6.1ii- Share of	0	2	2	0	4	0	0	2	0	0	1 0

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	°S	Nu	amber of associated NAIP indicators									
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
freshwate r ecosyste ms and their services, in particular forests, wetlands, mountain s and drylands, in line with obligation s under internatio nal agreemen ts	important sites for terrestrial and freshwater biodiversity that are covered by protected areas, by ecosystem type		terrestrial and inland water and 10% of coastal and marine areas are preserved	e to climate variabilit y	to climate related risks	agricultural land under sustainable land managemen t practices (SSLM)											
15.2 By 2020, promote the implemen	15.2.1 Progress towards sustainable forest management	1.7.1 Bio- diversity, conservatio n and sustainable	1.7.1.1 At least 75% of agricultural land is placed under	6. Resilienc e to climate	6.1 Resilience to climate related risks	6.1ii- Share of agricultural land under sustainable	0	3	2	0	2	1	0	4	0	2	1 4

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	7 5	Nu	mber	c of a	issoc	iated	NA	IP in	dicat	ors			
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
tation of sustainabl e managem ent of all types of forests, halt deforestat ion, restore degraded forests and substantia lly increase afforestati on and reforestati on globally		natural resource managemen t.	sustainable land management practice	variabilit y		land managemen t practices (SSLM)											
15.3 By 2030, combat desertifica	15.3.1 Proportion of land that is degraded over			6. Resilienc e to climate	6.1 Resilience to climate	6.1ii- Share of agricultural land under	0	2	0	0	1	1	0	3	0	0	7

Relevant SDG Indicators		Relevant Age (First 10-year		Identified BR Indicators Number of associated NAIP indicator Perform ance Theme Sub-theme Indicator uige uige <thuige< th=""> uige <t< th=""><th>ors</th><th></th><th></th></t<></thuige<>								ors					
Goal	Indicator	Priority area	Targets	ance		Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
tion, restore degraded land and soil, including land affected by desertifica tion, drought and floods, and strive to achieve a land- degradati on- neutral world	the total land area					land managemen t practices											
15.8 By 2020, introduce measures to	15.8.1 Proportion of countries adopting relevant national	1.7.1 Bio- diversity, conservatio n and sustainable	1.7.1.1 At least 75% of agricultural land is placed under	6. Resilienc e to climate	6.1 Resilience to climate related risks	6.1ii- Share of agricultural land under sustainable	0	0	0	0	0	0	0	2	0	0	2

Relevant SDG Indicators		Relevant Age (First 10-year		³ Identified BR Indicators					Number of associated NAIP indicators											
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total			
prevent the introducti on and significan tly reduce the impact of invasive alien species on land and water ecosyste ms and control or eradicate the priority species	legislation and adequately resourcing the prevention or control of invasive alien species	natural resource managemen t.	sustainable land management practice	variabilit y		land managemen t practices (SSLM)														
16.1 Significan tly reduce all forms of violence	16.1.2 Conflict- related deaths per 100,000 population, by sex, age and cause	4.13.1Maint anance and Restoration of Peace and security	4.13.1.1 Level of conflict emanating from ethnicity, all	8. Addition al indicator s	8. Additiona 1 indicators	8.12 Number of households affected by conflict	0	1	0	0	0	0	0	1	0	1	3			

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	Number of associated NAIP indicators											
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
and related death rates everywhe re		3.12.2 Participator y Developme nt and Local Governanc e	forms of exclusion 50% of religious and political differences are at most 2013 levels. 3.12.2.3 Reduce local conflicts to zero by 2020														
17.5 Adopt and implemen t investme nt promotio n regimes	17.5.1 Number of countries that adopt and implement investment promotion regimes for least developed countries			8.Additi onal indicator	8. Additiona l indicator	8.11 Execution rate of public expenditure	6	1	0	0	1	0	0	0	0	2	1 0

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	Number of associated NAIP indicators												
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
for least develope d countries								1)	0			I	<u>L</u>	U		
17.9 Enhance internatio nal support for implemen ting effective and targeted capacity- building in	17.9.1 Dollar value of financial and technical assistance (including through North- South, South- South and triangular cooperation) committed to developing countries			8. Addition al indicator s	8.Additio nal indicators	8.8 Capacity to implement beyond extension	0	1	0	0	0	0	0	2	0	0	3
developin g countries to support national plans to implemen						8.2 Communic ation and media	0	0	0	0	0	0	0	6	0	2	8

Relevant SDG Indicators		Relevant Age (First 10-year		Identified BR Indicators					Number of associated NAIP indicators										
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total		
t all the Sustainabl e Develop ment Goals, including through North- South, South- South and triangular cooperati on																			
17.10 Promote a universal, rules- based, open, non- discrimin	17.10.1 Worldwide weighted tariff- average	1.4.3 Economic diversificati on and resilience	1.4.3.4 Level of intra- African trade in agricultural commodities and services is increased by at least	5. Intra- African trade in agricultu re commod ities and services	5.1 Intra- African trade in agricultur e commodi ties and services	5.1- Growth rate of the value of trade of agricultural commoditie s and services	6	4	5	3	1 2	1	3	2	3	0	3 9		

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	BR Indicator	'S	Nu	mbeı	of a	ssoc	iated	NA	IP in	dicat	ors		
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
atory and equitable multilater al trading system under the World Trade			100% in real terms.			within Africa, in constant US dollars				<u> </u>							
Organizat ion, including through the conclusio n of		2.8.1 Framework and institutions for a United Africa	2.8.1.5 The volume of intra-African trade is at least three times the 2013 level														
negotiatio ns under its Doha Develop ment Agenda		2.8.1 Fram ework and institutions for a United Africa	2.8.1.4 Active member of the African Free Trade Area		5.2 Intra- African trade policies and	5.2i- Trade Facilitation Index (TFI)	0	0	0	0	0	0	3	1	0	0	4
1.50104					institutio nal condition s	5.2ii- Domestic Food Price Volatility Index	0	0	0	0	0	0	1	0	0	0	1

Relevant SDG Indicators		Relevant Age (First 10-year		Identified	cs	Number of associated NAIP indicators											
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total
17.14 Enhance policy coherenc e for sustainabl e developm ent	17.14.1 Number of countries with mechanisms in place to enhance policy coherence of sustainable development	3.12.2 Participator y developme nt and local governance	3.12.2.1 All local governments have full administrativ e and institutional capacities and appropriate fiscal powers	7. Mutual accounta bility for actions and results	7.2 Peer review and mutual accounta bility	7.2- Existence of inclusive institutional ised mechanism s and platforms for mutual accountabili ty and peer review.	1	5	0	1	5	3	1	4	0	3	2 3
17.17 Encourag e and promote effective public, public- private and civil society partnershi ps, building on the	17.17.1 Amount of United States dollars committed to public-private and civil society partnerships			4. Eradicati ng poverty through agricultu re	4.2 Inclusive PPPs for commodi ty value chains	4.2- Number of priority agricultural commodity value chains for which a PPP is established with strong linkage to smallholder agriculture	1	0	2	1	1	2	1	0	1	1	1 0

Relevant SDG Indicators		Relevant Age (First 10-year		³ Identified BR Indicators					Number of associated NAIP indicators											
Goal	Indicator	Priority area	Targets	Perform ance Theme	Sub- theme	Indicator	Benin	Burkina Faso	Cote d'Ivoire	Guinea	Guinea-	Liberia	Malawi	Niger	Nigeria	Togo	Total			
experienc e and resourcin g strategies of partnershi ps																				
	17.18.3 Number of countries with a national statistical plan that is fully funded and under implementation, by the source of funding			7. Mutual accounta bility for actions and results	7.3 Biennial agricultur e review process	7.3 Country Biennial Report submission	0	2	0	0	0	1	0	0	0	0	3			
Total numb	otal number of indicators)												

www.feedthefuture.gov