

AMRII

AFRICAN MULTIDIMENSIONAL REGIONAL INTEGRATION INDEX

Handwritten mathematical notes and formulas:

$I = \prod p^{\alpha}$ $R_0 = \cup_p (IR_p)$

$\phi(R) \cong \prod \phi(R_p)$

$\phi(R_p) \cong \phi(\bar{R}_p) (\cong \mathbb{Z})$

$\phi(R) \cong \prod \phi(\bar{R}_p)$

R is valuation of completion K of \mathbb{Q}

$D(R[x]) = \frac{1}{g'(x)} R[x]$

$\bar{R}_p = \prod_{e|p} N_{e|K} (J_{S,1})$ $D(R[x]) = \frac{1}{g'(x)} R[x]$

$\prod = \prod_{d|n} L/K (g'(x)) R[\frac{1}{g'(x)} R[x]] : R[x]$

$d = d_{L/K}(x)$

$v_L(b) \geq e-1$ $s \geq \frac{e}{v_L(f)} > s-1$

$e(L/F) i_{F/K}(w) = \sum_{\chi} i_{L/K}(\chi)$

now follow by the structure of g and divide g .

$\phi(x) + 1 = \inf \{ (ig)_{x=1} \}$

$0 \leq c < a$

$\max \{ |c/a| \frac{b^c}{a^c} \}$ M

$a_n \rightarrow a$ \log

$m \log |b| +$



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FOREWORD

This report is a result of the effective collaboration between the African Union Commission (AUC), the Regional Economic Communities (RECs) and the African Union (AU) Member States and makes a significant contribution to the realization of the will of African leaders to achieve integration to facilitate the development of the continent.

The vision of African states to integrate into a single force and an audible voice in the United Nations is a project that has existed for more than half a century. There are various programs and projects that have been designed to translate this vision into reality. However, monitoring and evaluation is recognized throughout all these years as the missing link in the integration process. This parameter is cited as one of the main reasons why the integration process failed to achieve all the objectives it aimed at.

At the request of the African Ministers in charge of Integration to develop monitoring-evaluation frameworks for the integration process (2013), the African Union Commission, the United Nations Economic Commission for Africa (UNECA) and African Development Bank (AfDB) worked together to respond to this ministerial request.

This report is a booklet that presents the detailed design of one of the frameworks developed by the AUC which is the Multidimensional Index of African Regional Integration (AMRII). This new framework builds on the AUC's two key mainstreaming programs; the Abuja Treaty and Agenda 2063 by introducing the notion of thresholds as an innovation in the monitoring and evaluation of the Abuja Treaty. African integration.

This Index will be the single most important tool for monitoring and evaluating African integration. It will serve as an instrument for producing the African Union's Annual Report on African Regional Integration to highlight achievements, identify weaknesses, challenges and opportunities related to the African integration process.

In conclusion, I would like to congratulate the Officials of the RECs as well as the Experts from the Member States for their highly appreciated and beneficial collaboration.

I would like to invite all stakeholders in this process of accelerating African integration and make a call to them to make good use of it and to join forces in ensuring the annual revision of this instrument with a view to achieving a higher robust monitoring and evaluation framework.

Prof Victor Harison
Commissioner for Economic Affairs
African Union Commission

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The Report on the African Multidimensional Regional Integration Index (AMRII) was produced by the African Union Commission (AUC) in close collaboration with the Regional Economic Communities (RECs). The conclusions and analyses contained therein are those of the AUC Department of Economic Affairs and in no way represent the views of the AUC and its decision-making bodies.

The report was produced under the supervision of Prof. Victor Harison, Commissioner for Economic Affairs. Technical supervision was provided by the late Dr. N'Guettia René KOUASSI, former Director of the DEA, and Mr. Jean Denis Gabikini, Acting Director of Economic Affairs Department at the AU Commission. The technical team was composed of Mr. DJE N'Guessan Pierre (Statistician-Economist in charge of integration with the AU Commission), Mr. Manasseh NTAGANDA (Senior Policy Officer at the AU Commission), Miss Myranda LUTEMPO and Ms Laurette Francette ECKO (both Policy officers in charge of integration within the AU Commission).

We would like to extend our gratitude to all those who have helped to improve the quality of this new monitoring and evaluation framework. We are particularly grateful to the Experts of the Association of African Central Banks (ABCA), the National Institutes of Statistics (INS) and the RECs. These include: Joseph Rwanshote (IGAD), Azhari Karim (IGAD), Awira Anthony (IGAD), Amb. Salvator Matata (COMESA), Deogratias Kamweya (COMESA), Njeleka Malata (COMESA), Isiah Tafadzwa Gowera (SADC), Hobby Musaka Simuchile (SADC), Aggrey Niringiye (EAC), Love Uwase (EAC), Iliyasu Mustapha BOBBO (ECOWAS), Dr. Babatunde Idowu (ECOWAS), Alfred Bobe Ikaka (ECCAS), Touka Jules (ECCAS), Mamadi Kourma (CEN-SAD), Rabii Sakhi (UMA), Imed Ben Elhadj (UMA), Rabii Sakhi (UMA), Dr. Barassou Diawara (ACBF), Miss Marjorie Okora (ACBF), Dr. Robert Nantchouang (ACBF), Elsadig Abdalla (UMA), Falzana Atchia (ABCA), Tsabedze Bhekisisa Sicelo (ABCA), Badr El-Din (ABCA), Hamd Bader Eldeen Hussein Jubralla (ABCA), Lizzie Chikoti (CoDG / INS), Rosine Agnero Gnanazan (CoDG / INS).

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ACRONYMS & ABBREVIATIONS

AACB	Association of African Central Banks
ACM	African Common Market
AEC	African Economic Community
AfDB	African Development Bank
AMU	Arab Maghreb Union
AUC	African Union Commission
CEN-SAD	Community of Sahel-Saharan States
CET	Common External Tariff
CFTA	Continental Free Trade Area
CM	Common Market
CMI	COMESA Monetary Institute
COMESA	Common Market for Eastern and Southern Africa
CU	Customs Union
EAC	East African Community
EAMI	East African Monetary Institute
ECCAS	Economic Community of Central African States
ECOWAS	Economic Community of West African States
FTA	Free Trade Area
IGAD	Intergovernmental Authority on Development
MIP	Minimum Integration Programme
PTA	Preferential Trade Area
REC	Regional Economic Community
SADC	Southern African Development Community
UNECA	United Nations Economic Commission for Africa
VAT	Value Added Tax
WAMI	West African Monetary Institute

SUMMARY

Integration is considered a priority area for Africa's development and in this regard, Heads of State and Government have developed a panoply of projects to accelerate regional integration. We note the Organization of African Unity (OAU), the Lagos Plan of Action, the Abuja Treaty, the African Union, NEPAD and Agenda 2063.

However, the objectives targeted by these different programs have not been achieved for several reasons, among which we can mention the political will, the lack of funding, the lack of monitoring and evaluation.

Thus, the African ministers in charge of integration decided to make the program monitoring and evaluation a priority. That is why in May 2013, in Mauritius, they asked the AUC to develop monitoring and evaluation frameworks to allow implementation.

The African Regional Integration Index (ARII, 2016) was the first of the initiatives responding to the request of Ministers. However, the experts of the RECs and the Member States brought forth virulent criticism to this index. In their argument, the ARII was based mainly on comparison and did not cover enough dimensions and thus did not have subject of consultations.

In October 2016, the AUC, in response to the criticism decided to carry out a new inclusive study with a much more elaborate methodology that would meet the expectations of the stakeholders. The methodology used is based on technical meetings as well as the careful consideration of the objectives contained in Agenda 2063 and the Abuja Treaty.

The result of this study is the African Multidimensional Regional Integration Index (AMRII) which is a new index that includes 8 dimensions with 33 indicators and introduces thresholds for the indicators. The dimensions and indicators that make up this new monitoring and evaluation framework are grounded on the two major programs: Agenda 2063 and the Abuja Treaty. This novelty makes it possible to follow and challenge the RECs and the countries on their delays in the implementation of the decisions taken.

01

INTRODUCTION

CONTEXT

Since the wave of independence of African countries in the 1960s, the continent's Heads of State and Government have considered regional integration as a priority strategy that could enable them to ensure Africa's economic growth and development.

Thus, several plans and programmes have been adopted to translate this idea of integration into reality. The Organization of African Unity (OAU) is considered the very first initiative of African Heads of State and Government in their ultimate desire to have an integrated and peaceful continent. This followed the Lagos Plan of Action, the 1991 Abuja Treaty whose ultimate goal is to create the African Economic Community (AEC). The Abuja Treaty proposes a gradual evolution towards the creation of AEC by dividing the whole process into 6 different stages in 34 years, including the strengthening and creation of RECs, the elimination of tariff and non-tariff barriers, the Customs Union, the Free Trade Area, the Common Market and the Economic and Monetary Union.

Taking into consideration a new continental context¹ and in order to speed up the continental integration process with a view to establishing the AEC, the Heads of State and Government reaffirmed in Libya in the "Sirte Declaration (1999)" their commitment to implement the stages advocated in the Abuja Treaty. To this end, the Minimum Integration Programme (MIP) has been developed by the RECs and the African Union Commission² (AUC) as a convergence and harmonization mechanism focusing on a few priority areas in which pan-African institutions in charge of regional integration could pool their efforts and build on positive experiences for successful continental integration.

In spite of this panoply of initiatives decided by the African leaders, it is necessary to recognize that the process of integration is always lead in the wings. This slowness in the implementation of the regional integration process in accordance with the deadlines of the Abuja Treaty, despite the voluntarism expressed in the Sirte Declaration, is explained by a number of difficulties such as: the persistence of tariff barriers and non-tariff barriers, the divergence among States to define a common external tariff and the absence of financial compensation mechanisms for the establishment of the Customs Union (CU), the obstacles to the free movement of people and factors of production for the completion of the Common Market (CM), the weak harmonization of fiscal, monetary and financial policies at the regional level and the overlap of RECs.

¹Abolition of apartheid and the advent of democracy in South Africa in 1994

²The year the MIP was instituted.

Beyond these constraints and in spite of the goodwill repeatedly expressed in favour of african integration, the implementation of integration programmes continues to be hampered by problems related to:



- 1) The ratification by Member States of texts and treaties relating to integration, particularly the texts establishing the Free Movement of people and the Financial Institutions;
- 2) The shortage of basic infrastructure necessary for the interconnectivity of our national and regional markets;
- 3) The weakness of the industrial system for producing manufactured goods, which should boost intra-african trade which is currently estimated at only 14% (UN, 2018) and therefore still very low compared with intra-regional trade in other continents;
- 4) The persistence and fear of the loss of a part of national sovereignty by some African leaders necessary to accelerate the regional integration process;
- 5) The difficulty of rationalizing the Regional Economic Communities (RECs);
- 6) The absence of a compensation mechanism in the abandonment of certain national gains and policies to accelerate integration;
- (7) The weakness of the banking and financial sectors, which are essential for strengthening and deepening the financial markets and African institutions vital to mobilizing the financial resources needed to finance the Agenda 2063 and its 14 flagship projects; and
- 8) Non-harmonization of statistics for the design and monitoring-evaluation of integration programmes.

Thus, fifty years after the establishment of the Organization of African Unity (OAU), which in 2001 became the African Union (AU), African Head of States and Government agreed to revitalize the integration and development process in Africa by adopting in January 2015, Agenda 2063 which with its associated flagship projects, is now positioned as the African Union's major socio-economic development programme aimed at speeding up the process of structural transformation over the next 50 years.

It is in this spirit of accelerating regional integration that the African Ministers responsible for integration and taking into account the new impetus given to the integration Agenda of the Pan-African Development Programme asked the continental institutions concerned during their sixth Conference in April 2013 in Port Louis (Mauritius), to provide integration actors with a relevant tool for assessing the progress made by countries and RECs on regional integration.

Accordingly, the African Union Commission in close collaboration with the African Development Bank (AfDB) and the United Nations Economic Commission for Africa (UNECA) developed the Africa Regional Integration Index (ARII) which it made available to the various actors of African integration in 2016. Several experts from Member States and RECs contributed to this innovation in the evaluation of African integration. The ARII is a tool for comparing levels of integration among countries and among RECs.

RATIONALE OF THE STUDY

The design of a new monitoring-evaluation index of the integration process is justified on several levels, which are specified and presented in this part of the report.

The Africa Regional Integration Index (ARII)

The African Regional Integration Index (ARII) is the index developed to meet the demand of African Ministers in charge of integration. It has been developed jointly by the African Union Commission, African Development Bank (AfDB) and United Nations Economic Commission for Africa (UNECA). This index is composed of five dimensions and 16 indicators. These five dimensions include: trade integration, infrastructure integration, productive integration, free movement of people and financial integration. The normalization method used for indicator values is the MinMax³ method. The key indicators being expressed in different units have been standardized to bring them back to the same scale before they can be significantly combined to obtain the composite index. This method has been used for its simplicity and its room for comparisons among African countries and among RECs which is the key goal of the ARII.

The production of the ARII was based on a scientific process with the following seven stages:



1. Selection of relevant dimensions and indicators;
2. Indicator standardization procedures;
3. Calculation of dimensional indices and the ARII;
4. Calculation of REC composite indices;
5. The ARII index stress test;
6. ARII ranking methods;
7. Methods of representing the ranking of countries.

³The Min Max method consists of considering the minimum and maximum of a distribution and normalizing all other observations in the interval that these two values represent.

The ARII is a fundamental innovation in the process of assessing regional integration in Africa. Although this index has brought a major breakthrough in terms of assessing regional integration, we must nevertheless recognize all the shortcomings with which it suffers.

Limitations of the ARII

The index (ARII) that was proposed by African institutions in response to the request made by African Ministers in charge of integration has some limitations. In the ARII report, it is mentioned that the key role of the index is to provide a comparison among countries and among RECs on regional integration. And in this vein, the methodology used to allow it to achieve this role of comparison is based on the MinMax method.

Thus, by using the MinMax method to achieve the standardization obtained for the countries and the RECs, ARII is fully compliant with the role assigned. However, this tool does not make it possible to evaluate the level of implementation of the projects contained in the Abuja Treaty and the Agenda 2063. No information is provided on the speed with which the Integration Agenda is implemented. The comparison provided by the ARII is far from meeting the real needs of continental integration actors. A country may have the greatest level of integration in a specific area without being in step with the stages of the Abuja Treaty or the Agenda 2063.

This reality is similar to the school situation which is described as follows:



"In a classroom, after a homework assignment, the highest score could be 7/20 while knowing that the average standard required is 10/20. After using the MinMax method, the score of 7/20 is brought to 1 on a scale of 0 - 1. Admittedly, the student with this score of 7/20 is the best compared to other students, but he is below the average level required by standards".

The index remains to such a point that it can bring out an interpretation that does not conform to reality. It should be noted that what matters most today is the monitoring of the implementation of decisions and projects and as such, it is important to follow the implementation of programmes in the areas of African integration. This aspect of the evaluation not covered by the ARII is in the light of our analysis, a weakness to be filled. A comparison among countries is meaningful if we exclude the fact that countries are very suspicious of comparisons. One of the principles of the implementation of integration programmes is the 'variable geometry' of the programmes. The ARII does not appear to be very appropriate for drawing relevant lessons from past initiatives to accelerate the process of regional integration.

In addition, the ARII is only relevant in a small number of dimensions of integration. In its first edition published in 2016, the issue of taking into account only five dimensions was raised. All the dimensions mentioned in the Abuja Treaty are not included in the composition of the ARII. Furthermore, new emerging areas such as migration and the environment contained in Agenda 2063 and that can influence integration were not taken into account in the development of the ARII.

Accordingly, the decision of the African Union Commission to develop a set of indicators summarized in an index called **African Multidimensional Regional Integration Index (ARMII)** is justified and relevant since these indicators of the new index will serve as a roadmap to help countries and RECs in assessing their efforts in the implementation of the Abuja Treaty and the Agenda 2063.

Why the new index (AMRII) and what is its added value in the monitoring-evaluation of African regional integration?

For several decades, regional integration has been an important goal for African Heads of State and Government and is seen as the strategy for achieving development. In view of the fragmentation of the continent into several smaller markets, regional integration appears as the way forward for the creation of a large market which facilitates the free movement of capital, goods, people and services. It is also the optimal way to facilitate investment in key areas of infrastructure, energy, agriculture and industry for structural transformation of the continent. Thus, the new index will measure the progress made by countries, group⁴ of countries and regional economic communities (RECs) in the implementation of integration projects identified in the Abuja Treaty and those formulated in the Agenda 2063.



The index takes into account new emerging areas

The emerging issues stemming from globalization require the consideration of new areas that have an impact on integration and the future of African populations. These new areas include the environment, migration, climate change, social and cultural integration all of which should be taken into account when designing development programmes. This study which is intended to be exhaustive and quite complete, took care to include these new mentioned dimensions of integration.

By taking into account these emerging areas, the new index is different from the ARII which due to lack of data, was limited to five traditional dimensions of integration. It is in this sense that the new index can be considered as the fruit of a complementary study to that on the ARII.

⁴This refers to any regional or sub-regional organization of a number of states for the purpose of integration.



The new index is a monitoring and evaluation framework for the implementation of integration programmes and projects

Unlike the ARII which as demonstrated above, based on the "MinMax" method and follows a logic of comparison among the countries and among the RECs, the new index is rather designed for the monitoring and evaluation of the process as well as for the determination of the level of implementation of countries and RECs in accordance with the different implementation plans designed for the various integration projects. The comparison does not in any way make it possible to assess the level of the RECs in the implementation of the programmes and does not highlight the efforts made in the context of the implementation of the integration Agenda. The new index therefore fills this limitation of the ARII which could not forecast the implementation of an integration Agenda with the objectives, the deadlines and the plan which have been determined and fixed.

The new index (AMRII) is therefore a framework for assessing the achievements of the RECs in comparison with the objectives and stages of the integration Agenda and its related programmes.

SUMMARY OF THE ADDED VALUE OF THE NEW INDEX

The new study carried out by the AUC, after the one carried out in collaboration with UNECA and AfDB in 2016, presents a significant added value. As several voices have questioned the necessity of developing a new index, it appears important to highlight in Table 1 below the comparative elements of this new index in a bid to further underscore the need for this new index. Thus, we have summarized the differences between the two indices as follows:

	ARII	AMRII (NEW INDEX)
Objectives	Assess the level of integration of RECs and countries by comparison	Assess RECs through the implementation of key integration programmes.
Methodology	The MinMax method	The Objectives Method The Averages Method
The added value of the new index	-	Takes into account emerging areas like social integration, environmental integration and political integration. Use of thresholds
Roles	Compare countries and RECs in their efforts to implement the integration Agenda.	Serve as the main instrument in the drafting of the annual AUC Report of African Regional integration

METHODOLOGY USED FOR THE STUDY

This study aims to fill these gaps and limitations of the ARII mentioned above by adopting a clear and precise approach. Integration is defined as a continuous, dynamic and complex process. It is therefore necessary to link the different areas and their indicators to these three mentioned characteristics.

As a continuous process, the study on dimensions and relative indicators should include this temporal, non-static dimension (t, t+1, ..., t+n) in order to understand their trend in line with the roadmap of the Abuja Treaty and the Agenda 2063. Since integration is a complex process, its trends are strongly linked to the political and historical context of countries and communities, interactions among countries, the various sub-regional institutions and the international environment.

For these different elements to be taken into account, an institutional approach linking the proposed indicators to the vision and goals of each REC must be adopted in order to not only understand trends in the integration process for each area of integration in a particular way, but to also assess the progress or the delay of each REC in relation to the stages and timetable of the Abuja Treaty, as well as of the Agenda 2063 and other integration programmes.

The methodology is therefore divided into three major steps namely: the selection of dimensions and indicators, the calculation of indicators and the determination of thresholds.

Selection of Areas and Indicators

Since this study is intended to monitor and evaluate integration efforts in RECs and countries, the consultations involved them in order to facilitate the evaluation phase. This collective, inclusive and participatory methodology avoids exposing the new index to criticism from its users in the future. This approach will also prevent the new index from being affected in terms of credibility.

Thus, the selection of dimensions and indicators involved the Experts from the RECs, the Association of African Central Banks (AACB), the Committee of Directors-General of the National Statistical Offices (NSOs) as well as those of the AUC partner organizations such as UNECA.. The overall coordination was carried out by the AUC.

Also, it should be noted that the dimensions and indicators are based on African integration initiatives since the establishment of the OAU. Among these initiatives, the main ones are the Abuja Treaty and the Agenda 2063 because of their contents which also include a long-term vision with a fairly clear and comprehensive planning. Although other programmes such as the Lagos Action Plan contain very specific goals for integration, they have been swept away by lack of funding and

the difference between the international vision and the continental vision of integration and the development of the African continent.

Calculation of Indicators

Since indicators were selected on the basis of the implementation of the Abuja Treaty and Agenda 2063, the various calculations focused on the objectives assigned to each stage and on the different tools mentioned in these two integration agendas.

The indicators selected are both quantitative and qualitative. The quantitative indicators can be measured from relevant variables for each area of integration while the qualitative indicators are assessed on the basis of Community legal instruments. According to Cavoli (2012), integration indicators should be appropriate for measuring the degree of economic integration based on the following properties or principles:



- They should be simple and easy to understand;
- Data should be readily available for all sampled countries;
- They should be derived from economic rather than political considerations; and
- They should be supported by economic intuition about the behaviour of actors.

Since integration is a process, the indicators should incorporate this temporal dimension (t, t-1, t-2) and try to take into account all the elements of the trend relating to each integration dimension. Sub-regional integration in Africa covers complex phenomena and embraces diverse and often interdependent areas. The assessment of the progress (or stagnation) of integration cannot be carried out using a single unit of measure. There are no reference units such as the kilometre for distance or a monetary unit (the Shilling, for example), to quantify integration, which would facilitate data comparisons in time and space (between regional economic communities).

To overcome this difficulty, one solution consists in defining and identifying qualitative and/or quantitative, objectively verifiable indicators relating to the criteria of the integration selected and that are able to account for the progress or delay of the integration area. These indicators for assessing progress in the areas of REC integration need to take into account not only the intermediate objectives of each area but also the ultimate goals as decided in the integration agendas.

Determination of Thresholds

The thresholds presented for this study are a precise instrument of monitoring and evaluation that not only makes it possible to assess the level of progress, but also make it possible to draw the attention of the actors on the evolution of the integration and the measures taken to speed it up. These measures include both the revision of objectives and the definition of new and adapted strategies.

The method used to determine the thresholds is called the Goal Method (MDO). It considers the key objectives contained in the key integration programs upon which this study is based.

These objectives are extracted with the chronogram associated with them. For the quantitative indicators, the thresholds are found by spreading this objective over the time planned for its realization. The thresholds for the qualitative indicators are a bit more difficult to find. Indeed, it is for them to implement instruments or tools of integration. Goals are not numbers. For this reason, the study adopts the consensus that the implementation of an integration tool obeys five main steps: (i) Inter-State discussions, (ii) negotiation and drafting of agreements, (iii) Adoption of the Agreement, (iv) Ratification and (v) domestication. These different stages are used in order to be able to predict for a given year the threshold that must be reached to allow the implementation of the instrument in question.

02

DIMENSIONS OF INTEGRATION

PRESENTATION OF THE ABUJA TREATY AND AGENDA 2063

The two major integration agendas that have become the main basic projects for the activities of the African Union are the Abuja Treaty and Agenda 2063. These two projects form the basis for the daily actions carried out by the African Union Heads of State and Government to achieve the integration and development Agenda of the continent.

They were conceived with the ultimate goal of guiding the continent towards integration, peace and unity to represent a single and dynamic force in the international arena. They contain all integration projects capable of fostering continental integration. As such, they should serve as a basic foundation for the design of any integration monitoring and evaluation framework in Africa.

The Abuja Treaty

The Abuja Treaty, which was adopted on 3 June 1991 and entered into force on 12 May 1994, reflects the vision of the Organization of African Unity (OAU) Heads of State and Government, whose general objective is to realize the integration of the continent through the establishment of the African Economic Community (AEC). To create the AEC, the Abuja Treaty has been subdivided into six main steps which are:



- Establishment and strengthening of Regional Economic Communities;
- Elimination of tariff and non-tariff barriers;
- Regional Free Trade Areas and Inter-REC Customs Union;
- Continental Customs Union;
- African Common Market;
- Pan-African Monetary and Economic Union.

This gradual approach is justified by the fact that integration should first be consolidated at regional level by establishing and strengthening the RECs, which would eventually merge into the AEC.

The Abuja Treaty provides for a 34-year phased roll-out of a common market, an African Monetary Fund, an African Central Bank with a common currency, and an African Parliament. The Treaty also recommends strengthening cooperation in industry, agriculture, transport and energy.

The Abuja Treaty is based on a specific plan of action with a time period summarized in the following table:

DATES	STAGES
1994-1999	Strengthening of RECs and establishment of new RECs
2000-2007	Coordination and harmonization of activities Gradual elimination of tariff and non-tariff barriers
2008-2017	Regional Free Trade Area and Customs Union
2018-2019	Continental Customs Union
2018-2019	African Common Market
2024-2028	Economic and Monetary Union

Agenda 2063

Agenda 2063 was adopted in 2015 by the African Union Heads of State and Government as a continental programme of structural and socio-economic transformation whose ultimate goal is to achieve a united, peaceful and prosperous Africa representing a dynamic force in the arena of nations.

Through its 7 aspirations and 14 flagship projects, it proposes a coherent, pragmatic and achievable approach for the building of a socially cohesive African society where all the active forces, women and young people are major actors and beneficiaries of the continental transformation process.

Accordingly, Agenda 2063 should be considered as a unique opportunity to recreate the "African narrative" with a view to inspiring and energizing the African people and using their constructive energy to define and implement a feasible programme for unity, peace and development during the 21st century. The realization of the continental market is at the core of this transformative process through the establishment of the Continental Free Trade Area (CFTA).

Agenda 2063 is going to be implemented under five 10 year plans. The first 10 year implementation plan of Agenda 2063 covers the period between 2014-2023. For the 50 years of the implementation of Agenda 2063, there are 14 flagship projects in specific areas of the African integration process. These projects are:



- **Integrated high-speed train network:** This initiative aims to connect all African capital cities and commercial centres to facilitate the movement of goods, services and people, and further reduce traffic congestion in current and future systems.
- **Pan-African Virtual University:** This project aims to accelerate the development of human capital, science, technology and innovation by improving access to higher education and continuing training in Africa, reaching a large number of students and professionals in multiple sites simultaneously by developing relevant and high quality open, distance and electronic learning (ODeL) resources; and ensuring that every African student has guaranteed access to the university in any part of the world at any time (Page 136 of the Agenda 2063 Framework Document).
- **Formulation of a Commodity Strategy:** This initiative aims to enable African countries to add value, derive greater benefits from their products, integrate into global value chains, and promote vertical and horizontal diversification rooted in value-added and local content development as part of a holistic set of policies to promote the development of a socially and environmentally sustainable commodity sector.
- **Establishment of an annual African forum:** The purpose of this project is to bring together once a year, political leaders, the private sector, academia and civil society in Africa to discuss development issues, constraints and measures needed to achieve the aspirations and objectives of Agenda 2063.
- **Accelerating the establishment of the Continental Free Trade Area in 2017:** This initiative aims to significantly speed up the growth of intra-African trade and more effective use of trade as a driver of growth and sustainable development. In particular, it plans to double the volume of intra-African trade by 2022, strengthen the African common position and policy space in global trade negotiations and establish the following financial institutions within the agreed time frame: the African Investment Bank and the Pan-African Stock Exchange (2016); the African Monetary Fund (2018); and the African Central Bank (2028/34).
- **African passport and free movement of persons:** This programme aims to accelerate continental integration. A common African passport to facilitate the free movement of persons is one of the pillars of African integration and the accelerated growth of intra-African trade. This programme is also aimed at transforming African laws, which remain generally restrictive on the movement of persons despite political commitments, to remove borders in order to promote the issuance of visas by Member States with a view to improving freedom of movement of all African citizens in all African countries by 2018.



- **Silencing the Guns by 2020:** This initiative aims to concretize the commitment of the AU Heads of State and Government gathered on the occasion of the 50th Anniversary of the establishment of the OAU; “not to bequeath the burden of conflicts to the next generation of Africans”. “To end all wars in Africa by 2020” and “make peace a reality for all African people and rid the continent of international wars, put an end to inter- and intra-community conflicts, human rights violations, humanitarian disasters and violent conflicts and to prevent genocide”.
- **Implementation of the Grand Inga Dam project:** This project aims to stimulate energy production. Africa’s hydropower potential remains virtually untapped with only seven percent of the hydroelectric power currently exploited. and as such, Africa continues to have the lowest rate of hydropower utilization in the world. The optimal development of the Inga Dam will generate 43,200 MW of electricity (PIDA) to support existing regional power pools and their combined service to enable Africa to switch from traditional sources of energy to modern sources and to ensure that African citizens have access to clean and affordable electricity.
- **Pan-African Virtual Network:** This project which aims to promote services draws on a wide range of stakeholders and provides for the establishment of policies and strategies that will lead to transformational e-applications and services in Africa. This should lead to the improvement of physical infrastructure, especially the intra-African broadband terrestrial infrastructure and cyber security, thus making the information revolution the basis of service delivery. In addition, the African Internet Exchange System (AXIS), e-Transform Africa, which plans to transform Africa into an e-society, PIDA and the e-device parts factory deserve to be considered as priorities.
- **Space:** This project aims to strengthen Africa’s use of space technology to support its development. Space is of paramount importance for Africa’s development in all areas: agriculture, disaster management, remote sensing, weather forecasts, banking and financial systems, as well as defence and security. Africa’s access to space technology products is no longer a luxury and that is why it is necessary to speed it up. Recent developments in satellite technologies make them very accessible to African countries. The Brazzaville meeting on space and air technologies highlights the need for appropriate policies and strategies to develop the regional market for space products in Africa.
- **Single African Air Transport Market:** This project aims to promote a single African air transport market to facilitate the air transport sector in Africa.



- **Continental financial institutions:** The establishment of African continental financial institutions is aimed at accelerating the integration and socio-economic development of the continent. These are institutions that play an important role in resource mobilization and financial sector management. The flagship projects described above will serve as catalysts for a large-scale transformation of the continent that will generate benefits in many of its regions. These projects will form the basis of the first Ten-year Implementation Plan of Africa's Agenda 2063.
- **Cyber security:** The decision to adopt Cyber Security as a flagship programme of Agenda 2063 is a clear indication that Africa needs to not only incorporate in its development plans the rapid changes brought about by emerging technologies, but also to ensure that these technologies are used for the benefit of African individuals, institutions or nation states by ensuring data protection and safety online. The Cyber Security project is guided by the African Union Convention on Cyber Security and Personal Data Protection.
- **Great African museum:** The African Charter for African Cultural Renaissance recognises the important role that culture plays in mobilising and unifying people around common ideals and promoting African culture to build the ideals of Pan-Africanism. The Great African Museum project will create awareness about Africa's vast, dynamic and diverse cultural artefacts and the influence Africa has had and continues to have on the various cultures of the world in areas such as art, music, language, science, and so on. This will be a focal centre for preserving and promoting the African cultural heritage.

THE DIMENSIONS OF INTEGRATION

The dimensions of integration were developed using a consultative methodology described above that meets the objective of the study. The dimensions were selected on the basis of the main milestones of the Abuja Treaty and the objectives of Agenda 2063. The AUC used the different national, regional and continental experts to ensure that the dimensions selected come from enriching and varied discussions.

Thus, several validation meetings on the dimensions were organized. The last of these meetings is the one held in Kampala (Uganda) in September 2018. During this meeting, the RECs Experts adopted the study and the index (AMRII) and requested the AUC to submit it to the AU Decision Organs.

The dimensions come from the four main objectives mentioned and pursued by the Abuja Treaty, notably:



- The preferential trade area;
- The free trade area;
- The Customs Union;
- The Common Market.

For a better achievement of these objectives mentioned above, these main dimensions have been split into sub-dimensions to allow a fairly methodical monitoring and evaluation of the integration process. The dimensions thus selected for the development of the AMRII index are:



- The free movement of people;
- Trade integration;
- Integration in terms of infrastructures;
- Social integration;
- Financial integration and free movement of capital;
- Monetary integration;
- Institutional integration; and
- Environmental integration.

Free movement of persons

The Free Trade Area is based on the free movement of people, goods and services. The free Trade Area represents one of the fundamental pillars in terms of stages on which integration actors must rely for the success of African regional integration.

The free movement of persons means that any national of a Member State of an economic integration organization (REC for example) has the right to move freely from one Member State to another without hindrance of any kind. This is one of the fundamental criteria of the Free Trade Area and the Customs Union. This freedom of movement for the people within a community can be concretized by several actions including the reduction of the obstacles to the entry of the countries of this community. The removal of obstacles includes the type and number of documents required at the entry of each country of the community and the difficulty in obtaining the documents required by the different countries.

Trade integration

Just as the free movement of people flows from the free trade area, trade integration is a goal of the free trade area. Trade integration involves the removal of tariff and non-tariff barriers to economic transactions and the harmonization of rules of origin. The removal of trade barriers allows the circulation of factors of production within the areas considered.

According to the liberal conception, trade integration is assimilated to the liberalization of trade and factors of production. It is analysed in terms of global integration. Trade integration is about reducing distortions in national policies and bringing national borders closer to the international market.

There are four main forms of trade integration ranging from a flexible association of trading partners to a fully integrated group of nation-states:



- **A free trade area;** where members eliminate trade barriers between themselves, but each continues to operate its own barriers against non-members.
- **A customs union;** where members eliminate trade barriers between themselves and establish uniform barriers against non-members, particularly a common external tariff system.
- **A common market;** a customs union that also provides for the free movement of labour and capital across national borders.
- **An economic union;** a common market that also provides for the unification of the general objectives of members in terms of economic growth, etc., and the harmonization of monetary, fiscal and other policies.

Infrastructure Integration

Trade in a given area is guaranteed not only by the free trade area, but also by infrastructure development. Taking into account the physical infrastructure (road, rail, air, maritime, telecommunications, energy, etc.) is decisive for the facilitation and development of trade on one hand and the free movement of persons on the other within an integrated space.

For a group of countries of the same community, infrastructure integration is a process for the establishment of common infrastructure to facilitate the realization of several activities. Infrastructure is a set of interconnected elements providing the framework for the operation and realization of the activities of a city, a country, a region (REC for example) or a continent.

Infrastructure is a key dimension of the Integration Agenda with the inclusion of the Infrastructure Development Programme in Africa (PIDA).

Integration of people or social integration

Social integration is a dimension that takes a look at the social aspects of the integration process. It reinforces projects related to free movement, health, migration, etc. Social integration refers to the structural, cultural and identity dimensions of integration.

It is mainly based on a deliberate effort of cooperation between individuals and groups of different nationalities. It is a process of social cohesion between nationals and other populations from a given community. Social integration mainly takes into account inter-individual relationships to be integrated in the knowledge of the social links that an individual has with his direct and indirect professional and political environment

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Financial integration and the free movement of capital

The common market, which is one of the objectives of the Abuja Treaty, aims to achieve a community space without internal borders in which the free movement of goods, persons, services and capital is ensured and where macroeconomic policies are partially harmonized.

There is a general consensus among theoreticians that the liberalization of the financial account (or external financial liberalization) must be decreed only if it is preceded by total trade liberalization especially by a reform aiming at the consolidation of the financial sector. McKinnon (1991) and McKinnon and Pill (1997) argue that because of the moral hazard associated with the financial sector, the liberalization of the financial account must remain the last step in the integration process. Before we can talk about the financial dimension of such a process, we should remember the stages of a complete regional integration.

Countries must follow several steps before creating full financial integration following these actions:



- Reform the domestic financial sector;
- Monitor a sound macroeconomic policy ensuring economic stability (fiscal policy, monetary policy, and exchange rate policy);
- Achieve the liberalization of the current account;
- Strengthen financial regulation, supervision and prudential supervision of the financial system;
- Establish an adequate legal system, in particular to prepare an appropriate institutional and political environment to address the risks of unhindered mobility of capital between countries.

Monetary integration

The Sixth Stage of the Abuja Treaty provides no later than 2018 for the setting up of an African Economic and Monetary Union, through the consolidation of the African Common Market, and the establishment of an African Monetary Fund, an African Central Bank and an African Parliament.

Monetary integration goes beyond financial integration as Member States establish a common currency and a central bank, giving up sovereignty over monetary and exchange rate policies, which are henceforth entrusted to a supra-regional central bank.

Monetary integration is characterized by the following criteria:



- Completion of a single market by removing all internal barriers to the free movement of persons, goods, capital and services in the region;
- The similarity of economic and social structures and the adoption of a sustainable convergence programme. The degree of convergence is assessed on the basis of the following criteria: (i) a high degree of price stability, (ii) sound public finances, (iii) a stable exchange rate, and (iv) long-term stable interest rates;
- The establishment of a regional monetary institute tasked mainly with ensuring the technical preparation for the creation of the single currency and the monitoring of macroeconomic convergence criteria.

Institutional integration

This area is characterized by the establishment of community institutions relating to legislation, justice, defence and currency. Theoretically this is the final stage of the integration process. It can be done in several stages.

The objectives include: promulgating uniform laws and legislation to strengthen regional integration; ensuring that the REC Treaty is interpreted in compliance with the law; resolving conflicts and maintaining peace; eliminating costs related to foreign exchange operations and risks; and, facilitating the free movement of persons, goods and services through the single-currency payment arrangement.

The first step at community level is the establishment of community institutions such as the parliament, the court of justice or defence force, etc.

The second step, which is the final step at the continental level, consists of:



- Defining citizenship, coupled with the adoption of a continental passport, an anthem and a motto;
- Surrendering State sovereignty in political, economic, financial and monetary spheres;
- Establish a parliament, a court of justice and a federal state across the continent.

Environmental Integration

The concept of sustainable development is based on an approach that takes into account not only economic objectives but also social and environmental objectives that are well established and highlighted in the development cooperation objectives of the RECs and of Agenda 2063.

However, the implementation of sustainable development remains a challenge both regionally and globally. Climate change represents a huge additional challenge for Africa's development, interacting with existing environmental trends and intensifying pressures. They also offer an extraordinary opportunity to stimulate new thinking and to promote more sustainable development paths in line with the regional integration Agenda.

Increasingly, environmental conditions are also related to security issues and potential conflicts particularly related to access to natural resources and their management, 'environmental refugees' and the resulting social and political problems. The eradication of poverty in a development context is a fundamental objective of the AU's development policy. Given the important contribution of environmental goods and services to the livelihoods of the poorest, effective integration of the environment is a crucial element in the fight against poverty.LDS

After defining the integration dimensions for the development of the AMRII index, the study examined in this section, the selection of indicators and the calculation of these indicators with their different thresholds. They are clearly described with their definitions, calculation methods, interpretations and sources.

03

MONITORING AND EVALUATION INDICATORS AND THRESHOLDS

MONITORING AND EVALUATION INDICATORS

For each of the selected dimensions, there is a basic objective already defined on which we rely for the evaluation. This objective which can be considered as a target, derives from either the Abuja Treaty's action plan or the Agenda 2063 strategic plan. These various basic documents include agreed timelines, priorities or integration. These objectives or targets represent the basis of the indicator selection logic.

The ultimate objective of the indicators is to assess the progress made by each REC or by each country (in the future) in the implementation of the Abuja Treaty and Agenda 2063 through the achievement of their milestones or their vision and aspirations. They offer the opportunity to take into account the priorities and resources available for each of the countries or RECs evaluated. As such, it is necessary to take into account this reality of autonomous evolution of the RECs in the implementation of the Integration Agenda. Indicators as well as dimensions must be able to bring out an assessment that reflects the reality of what is happening in countries and RECs.

As mentioned above, the selected indicators are of two types (quantitative or qualitative) based on the objectives and targets of the Integration Agenda. This Agenda contains both quantifiable and non-quantifiable objectives.

For the calculation of the indicators, the notion of gradualism was used for all indicators that mention any integration instrument or tool as an institution, a community passport. Indeed, it is undeniable that the implementation of these instruments requires a number of steps to achieve.

Thus, it was agreed to retain 3 main steps in the implementation of the integration instruments. These are:



- The discussions and reflections,
- The drafting of the agreement on the instrument,
- The signature and ratification of the agreement on the instrument.

This consideration makes the evaluation more realistic because the intermediate phases are taken into account and this makes it possible to avoid that, in the absence of this instrument in a given country or CER, one is still able to highlight efforts to put this instrument in place.

When an instrument is not yet effective in a REC, the evaluation can determine to provide a value that reflects the efforts made towards the realization of this instrument. This value expresses the level at which the country or REC is in the process of setting up this instrument. Thus, for all the indicators with binary modalities, we retain that there are intermediate values between 0 and 1.

For other type of quantitative indicators, normalization is used to bring them back to the 0.1 range.

Thus, all indicators will have values between 0 and 1

Indicators of free movement of persons

The Third Stage of the Abuja Treaty provides for the establishment of a Free Trade Area within each Regional Economic Community through the elimination of trade barriers and the creation of a customs union, as well as the adoption of a common external tariff. This implies free movement of persons and goods, which involves the adoption of a number of measures and policies within the countries and the RECs.

For free movement to be concretely achieved, the States must implement the second stage of the Abuja Treaty which recommends the coordination and harmonization of the activities of Regional Economic Communities as well as the gradual harmonization of customs duties in relation to third States. These measures entail a long process, characterized by several agreements, treaties and conventions between States. It would be extremely tedious to conduct an assessment that covers the entire process, given that RECs have different processes. That is why the study lays greater emphasis on the ultimate objective, which is the achievement of tangible and concrete results. Therefore, the indicators used to evaluate the effectiveness of free movement are:



- Community passport
- Visa between Member States
- Free Movement Protocol

INDICATORS	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Community Passport (Qualitative Indicator)	The community passport is a document or identification issued by the authorities of all countries of the community to their citizens	The calculation is based on whether or not the document exists in the community Yes="1", No="0"	A value of 1 means that the community is working towards integration through the creation of instruments to facilitate free movement. A value of 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process	Airports, frontier posts, les Ministries in charge of Foreign Affairs and of Integration, Embassies and consulates, RECs Secretariats
Visas between Member States (Qualitative Indicator)	The Visa is a document issued by the competent authorities of a country to a foreigner and which the latter should present upon entry into the territory of that country.	The calculation is based on whether or not the document exists in the community Yes="1", No="0"	A value of 0 means that the community is working towards integration through the establishment of instruments to facilitate free movement. The value of 1 indicates that the community has not succeeded in making this instrument a reality. However, it could be in an advanced stage in the process.	Airports, frontier posts, les Ministries in charge of Foreign Affairs and of Integration, Embassies and consulates, RECs Secretariats
Free Movement Protocol (Qualitative Indicator)	The free movement protocol is an agreement in principle between States for the purpose of progressively guiding them to achieve free movement of persons in the zone.	The calculation is based on whether or not the document exists in the community Yes="1", No="0"	A value of 1 means that the community is working towards integration by effectively engaging in the process of free movement. However, it should redouble efforts if it has not reached the community passport. The value of 0 means that the community has not succeeded in concretely establishing itself in the process of free movement of persons.	RECs Secretariats

Table 3: Indicators of the Free Movement of Persons (Source: AUC, 2018)

Trade Integration Indicators

In the process of integration of Regional Economic Communities (RECs), trade integration is at the second and third stages of the Abuja Treaty. It is characterized by the elimination of customs duties, tariff and non-tariff barriers. These provisions are expected to result in an increase in the volume of intra-African trade and a reduction in the independence of African countries vis-à-vis imports of manufactured goods from countries of Europe and Asia.

Trade integration indicators should therefore take into account both the instruments ensuring the removal of the various barriers and the volume of trade within the community.

Following this logic, the selected trade integration indicators are:



- The Common External Tariff (CET)
- Intra-Community imports of goods (as % of GDP)
- Intra-Community imports of services (as % of GDP)
- Intra-Community exports of goods (as % of GDP)
- Intra-Community exports of services (as % of GDP)

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Common External Tariff (CET) (Qualitative Indicator)	The CET is a common tariff for community members, often linked by a free trade agreement. The application of a common external tariff means that a product coming from a country outside the community will be taxed at the same rate regardless of its point of entry into the area	The calculation is based on whether or not the document exists in the community Yes="1", No="0"	A value of 1 means that the community is working towards integration through the creation of instruments to facilitate trade integration. A value of 0 means that the community has not succeeded in making this instruments a reality. However, it could be at an advanced stage in the process.	Ministries of Trade, Ministries of Integration, RECs Secretariats, etc.
Intra-community imports of goods/ services (Quantitative Indicator)	It is the total imports of goods/services made by countries of the same community between themselves.	Import of goods between <u>countries of the community</u> Total GDP of the community Import of services between <u>countries of the community</u> Total GDP of the community	The value of the indicator is between 0 and 1. The closer the value is to 1, the more the community is deemed to be contributing to the objective of trade integration with a high level of trade within its borders. Otherwise, the community is not integrated from the standpoint of trade in goods and services within its borders.	Ministries of Trade, National Institutes of Statistics, RECs Secretariats, etc.
Intra-community exports of goods/ services (Quantitative Indicator)	It is the total exports made by countries of the same community among themselves	Export of goods between <u>countries of the community</u> Total GDP of the community Export of services between <u>countries of the community</u> Total GDP of the community	The value of the indicator is between 0 and 1. The closer the value is to 1, the more the community is deemed to be contributing to the objective of trade integration with a high level of trade within its borders. Otherwise, the community is not integrated from the standpoint of trade in goods and services within its borders.	Ministries of Trade, National Institutes of Statistics, RECs Secretariats, etc.

Table 4: Trade Integration Indicators (Source : African Union Commission, 2018)

Infrastructure Integration Indicators

Infrastructure is an essential component of the Free Trade Area, which appears under Stage 3 of the Abuja Treaty. It contributes to both trade and the free movement of persons. Infrastructure covers several sectors, including, inter alia, transport (air, sea and rail), telecommunications and energy. The indicators developed are intended to highlight the manner in which the RECs put in place common and regional infrastructure to facilitate trade and the free movement of persons. For infrastructure, the evaluation indicators selected are:



- Intra-community roaming costs;
- Proportion of intra-community flights;
- Proportion of cross-border roads
- Existing railway network between the countries of the community
- Intra-community electricity trade per capita.

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Intra-community electricity trade	It is the community's electricity imports and exports for a year.	Intra-community electricity (<u>export+import</u>) Community total electricity consumption	This value is between 0 and 1. The closer the value is to 1, the greater the community's effort to integrate in terms of infrastructure. Otherwise, the community is not integrated from the standpoint of infrastructure	Ministries of Energy, National Institutes of Statistics, RECs Secretariats.
Proportion of cross-border roads	It is the number of cross-border roads by the number of inhabitants in the area considered	Number of cross-border roads <u>within the REC</u> Number of inhabitants	This value is between 0 and 1. It could be normalized for greater significance. The closer the value is to 1, the greater the community's efforts to integrate in terms of infrastructure. Otherwise, the community is not integrated from the standpoint of infrastructure.	Ministries of Energy, National Institutes of Statistics, RECs Secretariats.
Existing railway network between countries of the community	It is the number of railway lines by the number of inhabitants in the area considered	Number of <u>railway lines within the REC</u> Number of inhabitants	ween 0 and 1. It could be normalized for greater significance. The closer the value is to 1, the greater the community's efforts to integrate in terms of infrastructure. Otherwise, the community is not integrated from the standpoint of infrastructure	Ministries of Energy, National Institutes of Statistics, RECs Secretariats.
tra-community roaming costs	It is the total charges incurred to route calls made from a mobile phone by an operator other than that of the subscriber, especially from a foreign country	For a better appreciation of this indicator, the variation of the roaming costs is used for the calculation. $\frac{\sum (P_i - P_j)}{\text{Number of communities in the country}}$ Where P _i stands for the country prices, and i and P the average price in the area.	This value is between 0 and 1. The closer the value is to 1, the greater the community's effort to integrate in terms of infrastructure. Otherwise, the community is not integrated from the standpoint of infrastructure.	Ministries of Telecommunications, National Institutes of Statistics

Table 5: Infrastructure Indicators (Source: African Union Commission, 2018)

Social integration Indicators

Free movement of persons is reflected in the manner in which individuals who move from one country to another are integrated into the community. It is a further step in the evaluation of the free movement of persons. The way in which people are socially integrated is a yardstick for the assessment of the effectiveness of the application of free movement policies.

The indicators selected thus make it possible to assess the rights that are granted to members of the community who are in countries other than their country of origin. These indicators are:



- Right of settlement;
- Right of residence;
- Access to labour markets;
- Access to land.

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Regional payment system	It is the possibility, recognized by all the countries of the community, and conferred on every citizen of one of the countries of the community to settle in any other country of the community without being subject to difficulties or obstacles related to his nationality.	The method of calculating this indicator is binary. There are two modalities: either the right of settlement exists or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards the social integration of people through the implementation of policies. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be in an advanced stage in the process.	Embassies, Ministries in charge of Foreign Affairs, Ministries of Integration, Ministries of the Interior or National Security, etc
Right of residence	This is the possibility recognized by all the countries of the community and conferred on every citizen of one of the countries of the community to reside in any other country of the community without facing obstacles related to his nationality, race, etc.	The method of calculating this indicator is binary. There are two modalities: either the right of residence for a foreigner exists in another country of the community or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards the social integration of people through the implementation of policies. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Embassies, Ministries in charge of Foreign Affairs, Ministries of Integration, Ministries of the Interior or National Security, etc.
Access to the labour market	It is the possibility for a national of a country of the community to have access to the labour market (civil service) of another country other than his own	The method of calculating this indicator is binary. There are two modalities: either access to the labour market (civil service) by a foreigner exists in another country of the community or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards the social integration of people through policy implementation. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process	Ministries of Labour or Employment, Ministries of Civil Service, National Institutes of Statistics
Access to land	It is the possibility for a national of a country of the community to have access to land in another country other than his own.	The method of calculating this indicator is binary. There are two modalities: either access to the land by a foreigner exists in another country of the Community or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards the social integration of people through policy implementation. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Embassies, Ministries in charge of land issues, Ministries of Integration, Ministries of the Interior and Security, etc.

Table 6: Social Integration Indicators (Source: African Union Commission, 2018)

Financial Integration Indicators

The regional common market provided for by the Abuja Treaty for each REC is supposed to facilitate financial integration through the harmonization of financial and trade policies, and policies relating to the free movement of capital, etc.

The indicators used to evaluate the efforts of RECs to achieve this integration are:



- The regional payment system;
- The regional stock exchange;
- The clearing house;
- Regional macro prudential standards.

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Regional payment system	A payment system is a system consisting of a set of instruments, banking procedures and interbank money transfer systems designed to ensure the circulation of money.	The method of calculating this indicator is binary. There are two modalities: either the regional payment system exists in the community or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards financial integration through policy implementation. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Central Banks, Ministries in charge of the Economy and Finance, etc.
Regional Stock Exchange	The Regional Stock Exchange is a financial market in which transactions in securities and commodities of all countries in the region are carried out. It is the place where publicly traded equities and bonds are sold and bought by investors.	The method of calculating this indicator is binary. There are two modalities: either the regional stock exchange exists in the community or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards financial integration through policy implementation. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Central Banks, Ministries in charge of the Economy and Finance, etc.
Clearing house	The clearing house is a financial institution - an intermediary between the buyer and the seller - which guarantees the management of transactions, the correspondence between the debit and credit positions of the various parties involved, the offsetting of balances, margin calls, etc.	The method of calculating this indicator is binary. There are two modalities: either the clearing house exists in the community or it does not. Yes == "1", No == "0"	A value of 1 means the community is working towards financial integration through policy implementation. The value 0 means the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Central Banks, Ministries in charge of the Economy and Finance, etc.
Macro prudential standards	Macro prudential standards are the set of policies aimed at avoiding a large-scale disruption in the delivery of financial services that could have serious consequences for the real economy.	The method of calculating this indicator is binary. There are two modalities: either the macro prudential standards exist in the community or they do not. Yes == "1", No == "0"	A value of 1 means that the community is working towards financial integration through policy implementation. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Central Banks, Ministries in charge of the Economy and Finance, etc.

Table 7: Financial Integration Indicators (Source: African Union Commission, 2018)

Monetary integration indicators

One of the goals of the Abuja Treaty and Agenda 2063 is to guide the Continent towards an Economic and Monetary Union. This means that each REC should be able to have policies and instruments to facilitate monetary integration.

The indicators used for evaluating monetary integration are:



- Number of currencies in circulation in the area;
- Volume of trade involving payments in regional currencies.
- Convergence criteria's

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Number of currencies in circulation in the area	The currency is the payment instrument in place at a given time and place that is supposed to serve as a medium of exchange, store of value and a unit of account.	The calculation is simple. It consists merely in counting all the recognized national currencies. The number of currencies corresponds to the number of countries in the community.	The value is generally between 0 and 1. However, for some rare cases, it can be greater than 1. The higher the value, the less integrated the country is at the monetary level.	RECs, Ministries of the Economy and Finance, Central Banks, etc.
Volume of trade involving payments in regional currencies	It is the total imports and exports of the community for which payments are made in a currency of the region.	Intra comm(Imports+Exports) paid for in regional currencies Total Intra comm(Imports+Exports)	The value is generally between 0 and 1. The higher the value, the less integrated the country is at the monetary level.	Central Banks, Ministries in charge of Trade, RECs
Convergence Criteria's	Convergence criteria are criteria, based on economic indicators that the member states of the Regional Economic Communities must fulfil to realize the monetary zone. They impose control over inflation, public debt and the public deficit, exchange rate stability and the convergence of interest rates.	-	-	Central Banks, Ministries in charge of Trade, RECs
Access to land	It is the possibility for a national of a country of the community to have access to land in another country other than his own.	The method of calculating this indicator is binary. There are two modalities: either access to the land by a foreigner exists in another country of the Community or it does not. Yes == "1", No == "0"	A value of 1 means that the community is working towards the social integration of people through policy implementation. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	Embassies, Ministries in charge of land issues, Ministries of Integration, Ministries of the Interior and Security, etc.

Table 8: Monetary integration indicators (Source: African Union Commission, 2018)

Institutional and Political Integration Indicators

In all integration processes, the institutional and political level is the final phase, which comes in only when the communities have achieved excellent results in several areas.

The assessment of the Abuja Treaty in this area seems inconsistent as of today, but since this study is intended to be a dynamic evaluation instrument; it is important to take into account all the areas covered by the Abuja Treaty.

Thus, the indicators selected for this area of integration are:



- The Regional Parliament;
- The Regional Court of Justice;
- The Regional Armed Forces;
- The Regional Central Bank;
- The Regional University.

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Regional Parliament	The Regional Parliament is generally an elected assembly representing the peoples of the different States of a given community. It is an indicator of effective institutional and political integration.	The method of calculating this indicator is binary. There are two modalities: either the Regional Parliament exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards institutional integration through the operation of a parliamentary institution. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs
Regional Court of Justice	The Regional Court Of Justice is a specialized court which tries Members of Governments and State officials of the countries of a given region for acts committed in the exercise of their functions and for which they are held criminally liable.	The method of calculating this indicator is binary. There are two modalities: either the Regional Court of Justice exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards institutional integration through the operation of a judicial institution. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministry of Justice, etc.
Regional Armed Force	A Regional Army is a structured organization of armed men and women from different countries of the community, set up to ensure order, democracy and the defence of the territorial integrity of the region or community.	The method of calculating this indicator is binary. There are two modalities: either the Regional Army exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards institutional integration through the setting up of a regional institution. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of Defence, etc.
Regional Central Bank	It is a financial institution responsible for managing a currency common to all the countries of the Community.	The method of calculating this indicator is binary. There are two modalities: either the Regional Central Bank exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards institutional integration through the setting up of a regional financial institution. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of the Economy and Finance, etc.
Regional University	It is an institution responsible for training students from Member States of a community.	The method of calculating this indicator is binary. There are two modalities: either the Regional University exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards institutional integration through the setting up of a university institution. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of Higher Education, etc.

Table 9: Institutional Integration Indicators (Source: African Union Commission, 2018)

Environmental integration indicators

The environment is a recent dimension that has been integrated into development processes in countries around the world. In Africa, although not yet fully considered as a full dimension in the development process, its importance is gradually increasing.

As the area of the environment is emerging in Africa, the indicators selected focus on the establishment of a community system that acts in favour of the environment. Thus, the focus has been on programmes and institutions common to countries working for the day-to-day management of environmental activities in RECs.

The indicators selected are:



- Regional Environmental Management Plan;
- Regional regulatory institution for environmental protection activities;
- Community carbon tax;
- Regional Integrated Water Resources Management Programme (IWRM) ;
- Regional Institution for Integrated Water Resources Management (IWRM) ;
- Regional centre for collecting geo-spatial data on water resources.

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Regional Environmental Management Plan	A Regional Environmental Management Plan is a set of policies and programmes for continental and global environmental visions	The method of calculating this indicator is binary. There are two modalities: either the Plan exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards environmental integration through the implementation of a plan. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs
Regional regulatory institution for environmental protection activities	A regional regulatory institution for environmental protection activities is a specialized structure in charge of regulating and monitoring activities carried out within the REC in respect of the environment.	The method of calculating this indicator is binary. There are two modalities: either the regional institution exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards environmental integration through the establishment of a regional institution for the environment. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of the environment, etc.
Community carbon tax	The carbon tax is a tax added to the selling price of products or services depending on the amount of greenhouse gases, such as carbon dioxide (CO ₂), emitted during their use.	The method of calculating this indicator is binary. There are two modalities: either the community carbon tax exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards environmental integration through the implementation of a regional carbon tax. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of the environment, etc.

INDICATOR	DEFINITIONS	METHOD OF CALCULATION	INTERPRETATION	SOURCE
Regional Integrated Water Resources Management Programme (IWRM)	It is a Programme that aims to contribute to a wide dissemination of sustainable water management policies within the region	The method of calculating this indicator is binary. There are two modalities: either the regional programme exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards environmental integration through the implementation of a water resources management programme. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of the environment
Regional Institution for Integrated Water Resources Management (IWRM)	It is an institution that aims to contribute to a wide dissemination of sustainable water management policies within the region	The method of calculating this indicator is binary. There are two modalities: either the institution exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards environmental integration through the establishment of a regional water resources management institution. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of the environment, etc.
Regional centre for collecting geo-spatial data on water resources	It is an organization that brings together countries of the region and whose mandate is to collect the necessary information on water resources for dissemination to countries to guide their policies.	The method of calculating this indicator is binary. There are two modalities: either the centre exists in the community or it does not Yes == "1", No == "0"	A value of 1 means that the community is working towards environmental integration through the establishment of a regional centre. The value 0 means that the community has not succeeded in making this instrument a reality. However, it could be at an advanced stage in the process.	RECs, Ministries in charge of the environment, etc.

Table 10: Environmental Integration indicators (Source: AUC, 2018)

IN-DEPTH MEASUREMENT OF INDICATORS ON INTEGRATION TOOLS

The study was able to identify a set of indicators that can be categorized into 2 specific groups: qualitative indicators and quantitative indicators. Quantitative indicators are easier to have, whereas qualitative ones are even more complex to approach.

It is true that for these tools, whether the study is based on the realization or not, this binary information obtained at the end proves insufficient for the purpose of monitoring-evaluation in the study.

Thus, except for the realization or the existence of a tool (captured by the value 1) and the non-existence (captured by the value 0), the study wants to be more explicit and clear by finding intermediate values that can faithfully reveal the efforts made in the implementation of each of the tools considered in the definition of the indicators.

In this method of deepening the measurement of indicators that focus on integration tools, the study shares the implementation of a tool gives in 5 major steps. These steps are:



- Inter-country discussions and drafting of agreements
- Adoption of agreements between countries
- Ratification of agreements
- Ratification and
- Domestication of ratified agreements.

The first three steps are categorized into a large process of adoption, and the last two steps are classified in the domestication process.

PROCESS	STEPS
Adoption	<ul style="list-style-type: none"> • Inter-country discussions and, Consultation and drafting of agreements • Adoption of agreements between countries,
Domestication	<ul style="list-style-type: none"> • Ratification of Agreements • Domestication of the ratified Agreements

For the first process, each of the steps has the same weight, which is $1/3$. The second process comprising two steps with the same weightings, we end up with weights of $1/2$ for ratification and $1/2$ for domestication.

Then a qualitative indicator I_q is calculated according to this formula:



- $I_q = 0.5 * (1/3 * C + 1/3 * N + 1/3 * S) + 0.5 * (1/2 * R + 1/2 * D)$
Avec C: consultation, N: Négociations, S : Signature ou l'adoption,
R : Ratification et D : Domestication

With R being the ratio between the number (k) of countries that have ratified the instrument and the total number (T) of countries within the REC. **$R = k/T$**

And D is the ratio between the number (p) of countries that have domesticated the instrument and the total number of countries within the REC. **$D = p/T$**



**The sub-phase of domestication begins only when countries have reached the quorum of ratification allowing the entry into force of the instrument.

So: $Iq = 0.5 * (1/3 * C + 1/3 * N + 1/3 * S) + 0.5 * (1/2 * k/T + 1/2 * p/T)$

When a tool will be considered, it will be identified at which stage of realization the CER or the considered region is, which will constitute a value between 0 and 1. The more the value will be close to 1, one will say that the CER is advanced in the realization of this integration tool.

Each step counts for a quarter of the process. It has not been given different weight given the fact that the RECs have different realities that make the stages are not perceived with the same realities.

CALCULATION OF SECTORAL INTEGRATION INDICES

The present study while aiming to produce a multi-dimensional composite index intends to provide sectoral assessment tools to assess the efforts of countries or RECs in each of the dimensions selected in accordance with the Agenda for Inclusion. After having listed and defined the different dimensions with the indicators that define them, this part of the study is devoted to composite index calculations at the level of each of the 8 dimensions. These are the sectoral indices.

The sectoral indices are indeed composite indices that take into account the indicators defined and calculated for each integration dimension. The method used to obtain the sectorial indices is that of the arithmetic average. All indicators are transformed into quantitative variables between 0 and 1. Then, using the arithmetic average of the values of the indicators a value which also lies between 0 and 1 is obtained. This value makes it possible to assess the level of integration in each REC.

The arithmetic mean was used for the calculation of these sectoral indices because it is impossible and difficult to integrate weights or to consider the different indicators with different importance. Indeed, with the different priorities of each country and each REC, and also the possibility of changes with variable geometry, it appears inconsistent in the weighting of one dimension to the detriment of others. Countries and RECs are therefore pushed to invest in programs that seem more important to them. It is difficult to build indices by assigning different weights to certain dimensions. This avoids criticism of the weighting method in the future.



- $ID = \frac{1}{n} \sum_{k=0}^n I_k$, n is the number of indicators per dimension, I_k is the indicators retained for the dimension.

CALCULATION OF REGIONAL INDICES RI

The regional indices are calculated for each of the regions, ie the RECs. These indices are calculated to determine the level of progress of the different RECs taken individually.

Although the regional indices give less information than the sectoral indices, they do give an overall idea of integration at the REC level.

A regional index is the simple arithmetic mean of sector indices calculated for each dimension.



- $RI = \frac{1}{d} \sum_{k=0}^d ID$, d is the number of dimensions that is **8** in this study.

CALCULATION OF THE CONTINENTAL INDEX CI

The continental index is the composite index that uses the regional indices calculated for the 8 RECs. It is obtained by taking the simple arithmetic mean of these 8 regional indices. It also gives a global idea of the state of integration on the continent.



- $CI = \frac{1}{R} \sum_{k=0}^R IR$, R is the number of RECs on the continent that is 8.

THRESHOLDS OF THE INDICATORS

As mentioned above, this study develops a monitoring and evaluation framework which includes the definition of a threshold value against which the level of integration of RECs and countries will be compared. This will make it possible to deduce whether or not the RECs are in phase with the pre-established process for the implementation of the different integration agendas. Thresholds are an important dimension in the production of monitoring and evaluation systems. However, it requires a lot of precision and logic, especially when the project or programme objectives all are not defined in quantitative terms.

The two major programmes (Abuja Treaty and Agenda 2063) on which the AMRII is based contain both qualitative and quantitative objectives. Thus, care must be taken to transform each of the qualitative objectives into a quantitative objective before processing to the definition of the index. As difficult as it may be, when successful, this objective quantification exercise represents a very important added value in monitoring and evaluation systems because it makes it possible for stakeholders to have in their possession alerts regarding delays in implementation of the programmes and the projects of integration, to identify difficulties and obstacles and to make consistent decisions at all times.

That is why the African Union Commission wanted to add this particularity to the new evaluation framework so that it is a tool that offers the possibility not only to assess the achievements, to compare the RECs, but also to alert policymakers and other stakeholders to the appropriate policy to achieve the objectives set in the various integration programs. With this in mind, the report uses the method called the objectives method (OM).

The objective method is that for which the objectives defined by the Heads of State and Government and the actors of integration are taken into account. These objectives are included in the programmes of the integration projects. The study is expected to be able to produce a framework to make a comparison between the level of RECs in terms of implementation of integration programs and the objectives to be achieved. The new index is expected to be an instrument for monitoring and evaluating the Abuja Treaty, Agenda 2063 and other integration programmes adopted and taken into account by the AUC in its integration policy. The objectives contained in these different programmes should be used to determine the thresholds below or above which the RECs could be ranked and could also determine the obstacles faced by these RECs in order to help them have sufficient resources to keep pace with the previously defined action plans.

This method constitutes the second dimension of the composite threshold. Its implementation is not easy when it comes to objectives that have not been set in a fragmented form. Sometimes, the objectives do not explicitly cover the indicators selected. The values are determined by logical evaluation of the objectives set in the Abuja Treaty and in Agenda 2063.

The objectives method has been defined and constructed as follows:

- **For all quantitative indicators for which quantitative values have been defined as objectives,** it is sufficient to simply fragment it over time by spreading it over the period until the final date of the implementation of the final objective. For example, if for a given variable X, it has been said to increase this value to 50 by 2030, whereas in 2018 it is 20; then it is necessary to achieve an increase of 30 over the remaining 12 years to reach 2030. If we spread 30 over 12 years evenly, we need a 2.5 increase, the thresholds from 2019 to 2025 shall be as follows :

	2019	2020	2021	2022	2023	2024	2025
X	22.5	25	27.5	30	32.5	35	37.5

For all indicators whose objectives have been defined in terms of integration instruments or tools such as protocol institutions, etc., it is sufficient to implement these instruments in 5 specific phases:



- Inter-country consultations
- Negotiations and drafting of agreements
- Adoption of agreements between countries
- Ratification of agreements
- Domestication of ratified agreements

It should be noted that the first 3 stages are at the level of the RECs, ie the involvement of all the States; and the last two are at the level of the REC Member States.

The first 3 phases represent half (50% or 0.5) of the process of creating the integration instrument, and ratification represents the other half. For instruments that are supposed to be in place before 2018, the reality of the RECs has led to the conclusion that the ratification phase must have been completed by half of the Member States. Thus, the threshold for these integration instruments or tools is 75% (or 0.75). If 2018 is not the end year of the instrument implementation process, then we simply consider the suggested step in the integration agendas and the corresponding threshold. This threshold is evenly distributed over the entire period until maturity.

For objectives relating to banking, financial, monetary, etc., the objectives of these institutions are automatically retained. This is the case of the convergence criteria for central banks which are set by the Association of African Central Banks (AACB).

04

GENERAL CONCLUSION

The AUC undertook this study with a view to producing a more understandable and broader monitoring and evaluation framework for the integration process. With the prior existence of an index (ARII), the AUC also wanted to broaden the base of integration assessment tools. The purpose of this study was therefore to suggest a set of indicators that could be used to evaluate developments in the integration process of Regional Economic Communities according to the stages and deadlines of the Abuja Treaty on one hand and the vision of Agenda 2063 on the other hand. To this end, a methodical and scientific approach has emerged for the production of this report, which proposes a composite index called Multidimensional Index of African Regional Integration (AMRII).

In the first section, the context, basis, and rationale of the preparation of this report were recalled and explained. The existence of ARII required the study to rigorously specify its objectives, methodology and added value in terms of assessing integration. This section has set the scene for a better understanding of the work done by the AUC.

Since the Abuja Treaty and the Agenda 2063 are the two key programmes on which the entire study is based, it was necessary to recall in the second section, the main stages and the goals of these two programmes. The deadlines for each step and the other initiatives taken were recalled as a compass for the evaluation.

This section equally made an overview of the vision of Agenda 2063, highlighting the areas of integration selected among the eight priority projects. The selected dimensions were then presented in this section in order to link them to specific goals of the Abuja Treaty and Agenda 2063. There are 8 (eight) dimensions, as follows :



- Free movement of persons
- Trade integration
- Integration of persons or social integration
- Infrastructure integration
- Financial integration
- Monetary integration
- Institutional integration and
- Environmental integration

In section 3, the relevant criteria related to each institutional form of integration according to Balassa's vision was proposed. The components of each integration area and their criteria were defined. These criteria are based mainly on the features of institutional integration and the preconditions to be fulfilled in order to cross the integration process stages.

The section chose the criteria indicators for each area of integration and the method for calculating these indicators. This choice is based on three main principles:



- Must be simple and easy to understand
- Data readily available for all RECs member countries
- Formulate from economic concepts rather than political considerations; and
- Be supported by economic intuition on the behaviour of actors

For each indicator, care was taken to specify its goal, the data source and sometimes the verification source. Two categories of indicators were highlighted: qualitative indicators and quantitative indicators. With regard to the qualitative indicators, a binary relation was selected for their measurement: where the indicator is effective, the number "1" is attributed otherwise "0". These indicators are intended to evaluate the integration process of REC member countries and especially to compare achievements in their integration process. Finally, the third section also proposed to determine a threshold or indicator standard from which a criterion can be considered as fulfilled. Before that, the underlying challenges or problems to the determination of this threshold or standard were reviewed.

This report presents a new index (AMRII) that increases the options and tools available to policy-makers to improve their perception of the integration process in order to define appropriate strategies for the implementation of Agenda 2063 and the Abuja Treaty. It was designed to improve the quality of the assessment of the integration process. It is therefore available for policy-makers, researchers, academics, etc. The most fervent wish of the AUC is that it becomes the main tool for assessing integration par excellence.

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ANNEX 1:

RECs in the Implementation of the Abuja Treaty

REGIONAL ECONOMIC COMMUNITY	DEGREE (S) OF ECONOMIC INTEGRATION ENVISAGED	DEGREE OF ECONOMIC INTEGRATION ACHIEVED	DEADLINE FOR TREATY AND ASSEMBLY DECISIONS*
EAC	Free trade area Tripartite free trade area Customs union Common market Economic and monetary union	Yes (2000) Yes (2015) Yes Yes (2005) Yes (2010) Partially	2017 2017 2017 2023
ECOWAS	Free trade area Tripartite free trade area Customs union Common market Economic and monetary union	Yes (2001) No Yes (2015) No No	2017 2017 2017 2023
COMESA	Free trade area Tripartite free trade area Customs union Common market Economic and monetary union	Yes (2000) Yes (2015) Yes (2009) No No	2017 2017 2017 2023 2028
IGAD	Economic cooperation Free trade area Tripartite free trade area* Customs union Common market Economic and monetary union**	Yes No No No No No	2017 2017 2017 2023 2028
ECCAS	Economic and social cooperation Free trade area Tripartite free trade area** Customs union** Common market** Economic and monetary union*	Yes Yes No No No No	2017 2016 2017 2023
SADC	Economic cooperation Free trade area Tripartite free trade area Customs union** Common market** Economic and monetary union**	Yes Yes (2008) Yes (2015) Yes (2010) No No	2017 2017 2017 2017 2023
CEN-SAD	Economic cooperation Free trade area Tripartite free trade area ** Customs union** Common market** Economic and monetary union**	Yes No No No No No	2017 2017 2016 2017 2023
AMU	Trade Agreements Free Trade Area Tripartite Free Trade Area** Customs Union Common Market** Economic and monetary union**	Yes (2010) No No No No No	2017 2016 2017 2023 2028

*Decision of the African Union Assembly/AU/Dec.394 [XVIII].

ANNEX 2: Commercial and Productive Integration: Overview

REGIONAL ECONOMIC COMMUNITIES	EAC	ECOWAS	COMESA	SADC	ECCAS	IGAD	AMU	CEN-SAD
Trade Facilitation Measures								
Import Duties on Community Products	0%	5.9%	1.9%	3.8%	1.9%	1.8%	2.6%	7.4%
Single Customs Declaration Document	Yes	Yes	Yes	Yes	No	No	No	No
Common Non-Tariff Nomenclature	Yes	Yes	Yes	Yes	No	No	No	No
Free Movement of Persons								
Community Passport	Yes	Yes	No	No	No	No	No	No
Phasing out of Visas			Yes	Yes	No	No	No	No
Community Identity Card	Partially	No	No	No	No	No	No	No
Harmonisation of Academic & Professional Qualifications	Yes	No	No	No	No	No	No	No
Right of Residence	Common Market protocol in force (2010)	Residence and Establishment Protocol in force (1979)	Residence and Establishment Protocol Adopted but not in force(2011)	Residence and Establishment Protocol Adopted but not in force (2011)	No	No	No	No
Right of Establishment	Common Market protocol in force (2010)	Residence and Establishment Protocol in force (1979)	Residence and Establishment Protocol Adopted but not in force(2011)	Residence and Establishment Protocol Adopted but not in force (2011)	No	No	No	No
Transport Facilitation Measures								
Axle Load Limit	Yes	Yes	Yes	Yes	No	No	No	No
Harmonised Bid Guarantee Scheme	Yes	No	Yes	Yes	No	No	No	No
Carrier License	Yes	Yes	Yes	Yes	No	No	No	No
Customs Agreement on Interstate Road Transit	Yes	Yes	Yes	Yes	No	No	No	No
Project Financing Facilitation	Yes	Yes	Yes	Yes	No	No	No	No
Regional Development Bank	Yes	Yes	Yes	Yes	No	No	No	No

Source: African Union Commission, 2018

ANNEX 3: Fiscal and Financial Integration: Overview

REGIONAL ECONOMIC COMMUNITIES	EAC	ECOWAS	COMESA	SADC	ECCAS	IGAD	AMU	CEN-SAD
Harmonisation of VAT	Yes	Directive adopted in 2009 but not in force			No	No	No	No
Harmonisation of Excise Duties	Yes	Directive adopted in 2009 but not in force			No	No	No	No
Financial and Banking Harmonisation								
Capital Account Liberalisation	Yes	Yes	Yes	Yes	No	No	No	No
Regional Settlement and Payment Systems	Yes	Yes	Yes	No	No	No	No	No
Harmonisation and Regulation of the Banking system	Yes	Yes	Yes	Yes	No	No	Yes	No
Regional Stock Exchange Regulatory Authority	No	No	Yes	Yes	No	No	No	No

Source: AUC, 2018

ANNEX 4: Monetary Integration: Overview

REGIONAL ECONOMIC COMMUNITIES	EAC	ECOWAS	COMESA	SADC	ECCAS	IGAD	AMU	CEN-SAD
Currency Convertibility	Yes	No	No	No	No	No	No	No
Adoption of a Convergence Programme	Monetary cooperation programme adopted and multilateral monitoring mechanism functional	Monetary cooperation programme adopted and multilateral monitoring mechanism functional	Monetary cooperation programme adopted and multilateral monitoring mechanism functional	No	No	No	No	No
Establishment of a Monetary Institute	East African Monetary Institute in 2001 (EAMI)	West African Monetary Institute (WAMI)	COMESA Monetary Institute (CMI)	No	No	No	No	No

Source: AUC, 2018

ANNEX 5: Infrastructure Integration: Overview

REGIONAL ECONOMIC COMMUNITIES	EAC	ECOWAS	COMESA	SADC	ECCAS	IGAD	AMU	CEN-SAD
Transport Facilitation Measures								
Single Border Post	Yes	Yes	Yes	Non	No	No	No	No
Energy								
Regional and/or Sub regional electric power network	Yes	Yes	Yes	Yes	No	No	No	No

Source: AUC, 2018

ANNEX 6: Institutional Integration: Overview

REGIONAL ECONOMIC COMMUNITIES	EAC	ECOWAS	COMESA	SADC	ECCAS	IGAD	AMU	CEN-SAD
Regional Parliament	Yes	Yes	Yes	Yes	No	No	No	No
Regional Court of Justice	Yes	Yes	Yes	Yes	No	No	No	No

Source: AUC, 2018

ANNEX 7: Some thresholds by the Objectives Method

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Protocol for free movement within the RECs	All protocols relating to the free movement of persons in each REC are incorporated into national law by 2018	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Community Passport	the free movement of goods, services and capital will take place, and people traveling in any Member State could obtain the visa at the point of entry	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Visa between the countries of the REC	the free movement of goods, services and capital will take place, and people traveling in any Member State could obtain the visa at the point of entry	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Common External Tariff	the African Customs Union, the African Common Market and the African Monetary Union will be operational by 2023	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Intra-Community Exports of Goods (as% of Total Exports of Goods)	Intra-African trade increases from 10.1% in 2012 to 60% in 2063	0.8 NB: Although the annual increment to the set target is 1.2%, it's not realistic to achieve a linear growth under normal circumstances (1/1.2)
Intra-Community imports of Goods (as% of Total Exports of Goods)	Intra-African trade increases from 10.1% in 2012 to 60% in 2063	0.8 NB: Although the annual increment to the set target is 1.2%, it's not realistic to achieve a linear growth under normal circumstances (1/1.2)
Intra-Community imports of goods (as% of total imports of goods)	Intra-African trade increases from 10.1% in 2012 to 60% in 2063	0.8 NB: Although the annual increment to the set target is 1.2%, it's not realistic to achieve a linear growth under normal circumstances (1/1.2)
Service Imports (% of Total Imports of Services)	Intra-African trade increases from 10.1% in 2012 to 60% in 2063	0.8 NB: Although the annual increment to the set target is 1.2%, it's not realistic to achieve a linear growth under normal circumstances (1/1.2)
Intra-Community electricity trade	Regional energy pools boosted by an increase of at least 50% in energy production and by the Inga dam will be operational and will contribute to the electrification of the industrial transformation of the continent and the comfort of citizens by 2023	0.64 NB: Although the annual increment to the set target is 12.5%, it's not realistic to achieve a linear growth under normal circumstances. 8% annual is recommended (8/12.5)
Proportion of intra-community flights	African airspace will be opened to all African airlines	0.25 NB: This should be in line with the implementation of the Yamoussoukro Decision
Cost of roaming		
Infrastructure Development Inde	Complete all road, air, marine and electronic interconnection infrastructures 2025 and rail by 2040	0.5 NB: Reference to the AfDB Regional Infrastructure Index
Right of establishment	The African Customs Union, the African Common Market and the African Monetary Union will be operational by 2023 Free Movement of Persons, Rights of Residence and Establishment (2019-2023), 5th Stage Abuja Treaty	0.6 NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol <ul style="list-style-type: none"> • Consultations • Negotiations • Signature Stages for Protocol Implementation <ul style="list-style-type: none"> • Ratification • Domestication R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Right of residence	<p>The African Customs Union, the African Common Market and the African Monetary Union will be operational by 2023</p> <p>Free Movement of Persons, Rights of Residence and Establishment (2019-2023), 5th Step of Abuja Treat</p>	<p>0.6</p> <p>NB: 0.5*(Stages for protocol Formulation) + 0.5* (Stages for Protocol Implementation)</p> <p>Where:</p> <p>Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Access to the labour market	<p>The African Customs Union, the African Common Market and the African Monetary Union will be operational by 2023</p>	<p>0.6</p> <p>NB: 0.5*(Stages for protocol Formulation) + 0.5* (Stages for Protocol Implementation)</p> <p>Where:</p> <p>Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Access to land	<p>The African Customs Union, the African Common Market and the African Monetary Union will be operational by 2023</p>	<p>0.6</p> <p>NB: 0.5*(Stages for protocol Formulation) + 0.5* (Stages for Protocol Implementation)</p> <p>Where:</p> <p>Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional payment system	<p>Implementation of Regional payment system within RECs by 2023</p>	<p>0.6</p> <p>NB: 0.5*(Stages for protocol Formulation) + 0.5* (Stages for Protocol Implementation)</p> <p>Where:</p> <p>Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Regional Stock Exchange	Implementation of Regional Stock Exchange within RECs by 2023	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional Clearing House	Implementation of Regional Clearing House within RECs by 2023	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Rate of inflation	No change of Rate of inflation within RECs by 2023	<p>3%</p> <p>NB: Target by 2045 As established by Association of African Central bank and African Monetary Cooperation programme</p>
Prudential macro standards	Implementation of Regional payment system within RECs by 2023	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Existence of a regional banking network (To be reviewed)	Implementation of regional banking network within RECs by 2023	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

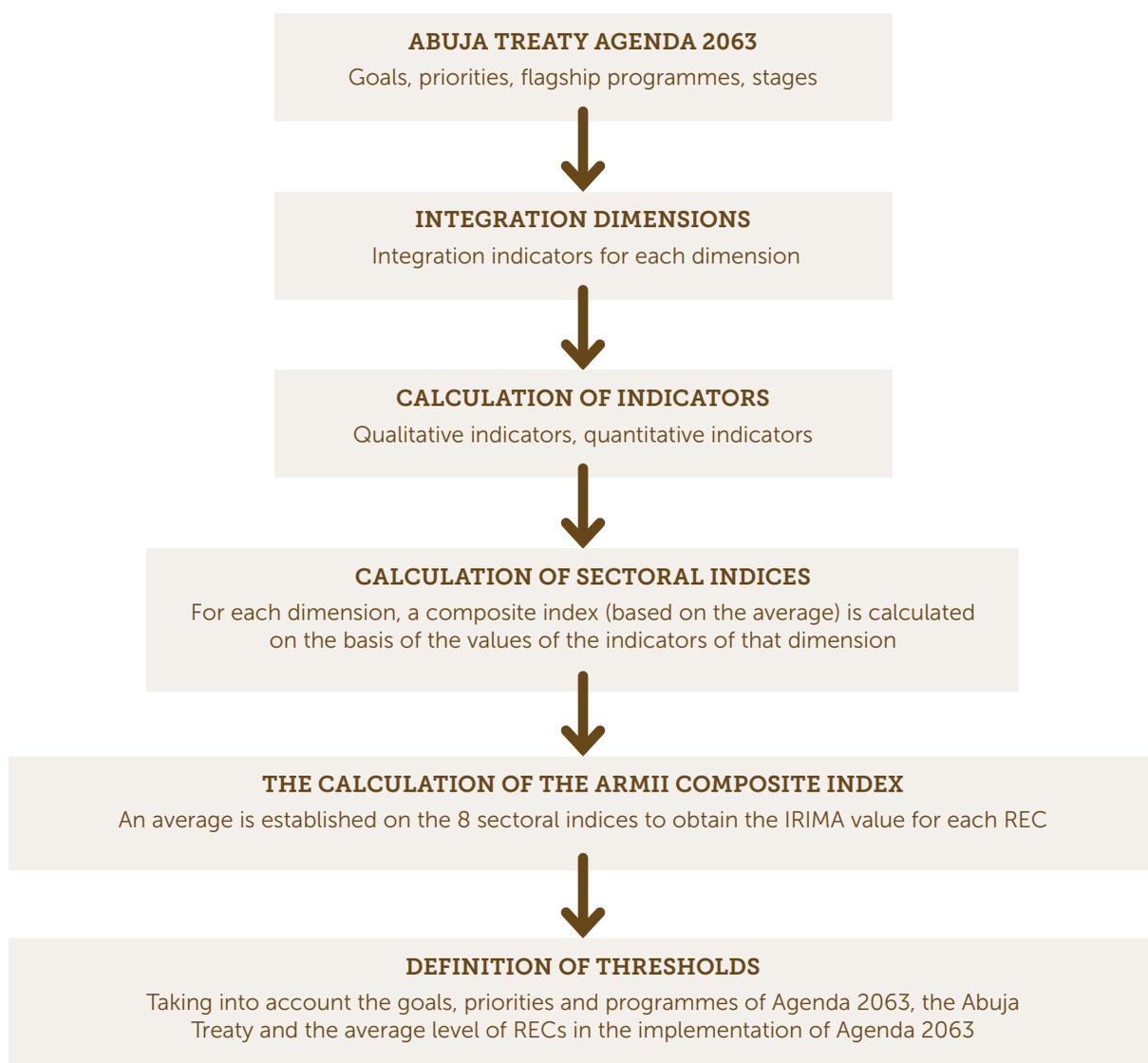
INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
<p>Number of recognized currencies in the REC</p>	<p>Establishment of a single currency by 2025</p>	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
<p>Proportion of intra-community trade settled in community currencies (National currencies)</p>	<p>Payment of all intra-community trade in regional currency by 2025</p>	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
<p>Regional Environmental Management Plan</p>	<p>Regional and Continental sustainability certification programmes implemented by 2020</p> <p>Binding agreements for fair, equitable and sustainable management exploration of transboundary natural resources (water, parks, ocnas) in place by 2020.</p>	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
<p>Regulatory authority for environmental protection activities</p>	<p>An African Climate Fund (ACF) to address the continent's climate change adaptation and mitigation issues, including technology development in place by 2025</p>	<p>0.7</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Community Carbon Tax	Binding agreements for fair, equitable and sustainable management / exploitation of transboundary natural resources (waters, parks, oceans) in place by 2020	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Community Plan for Integrated Water Resources Management (IWRM)	Regional and Continental sustainability certification programs implemented by 2020	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional Organisation of IWRM	Consolidate or create institutions dedicated to transboundary water management by 2023	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional Centre for Geospatial Data Collection on Water	An African Space Agency will have been established by 2023	<p>0.6</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Regional Parliament	Establishment of regional Parliament by 2025	<p>0.75</p> <p>NB: $0.5*(\text{Stages for protocol Formulation}) + 0.5*(\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional Court of Justice	Establishment of regional court of justice by 2025	<p>0.75</p> <p>NB: $0.5*(\text{Stages for protocol Formulation}) + 0.5*(\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional Army	Establishment of regional Army by 2025	<p>0.6</p> <p>NB: $0.5*(\text{Stages for protocol Formulation}) + 0.5*(\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>
Regional Central Bank	Establishment of the African Central Bank by 2028 (Abuja Treaty)	<p>0.6</p> <p>NB: $0.5*(\text{Stages for protocol Formulation}) + 0.5*(\text{Stages for Protocol Implementation})$ Where: Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

INDICATORS	TARGETS/OBJECTIVES	THRESHOLDS
Regional University	Establishment of regional university (research centres) by 2025	<p>0.75</p> <p>NB: $0.5 \times (\text{Stages for protocol Formulation}) + 0.5 \times (\text{Stages for Protocol Implementation})$ Where:</p> <p>Stages of Formulation of protocol</p> <ul style="list-style-type: none"> • Consultations • Negotiations • Signature <p>Stages for Protocol Implementation</p> <ul style="list-style-type: none"> • Ratification • Domestication <p>R= Number of countries that have ratified D= Number of Member States that have Domesticated the Protocol</p>

ANNEX 8: Summary of the African Regional Multidimensional Integration Index (ARMII)



ANNEX 9: Methodological Summary of the AMRII

STEP 1: Selection of the 8 dimensions

The dimensions were selected during the consultative meetings (06) between AUC, RECs, NSOs and Central Banks. The main programmes used to define these dimensions are Agenda 2063 and the Abuja Treaty.

STEP 2. Selection of indicators

For each of the 8 dimensions, indicators have been duly defined to assess the level of progress of the RECs for these different dimensions.

There are 2 types of indicators: Qualitative indicators and quantitative indicators.

Qualitative indicators describe adopted integration tools or instruments that must be implemented during the integration process.

Quantitative indicators refer to directly quantified objectives for which values are obtained during the data collection.

STEP 3 : Calculation of the indicators

• Qualitative Indicators

Qualitative indicators represent integration instruments whose implementation follows a generalized process in 5 stages:



- Consultations
- Negotiations
- Signature
- Ratification and
- Domestication

- **First phase:** Consultations (C), Negotiations (N), Signature (S)
- **Second Phase:** Ratification (R) and Domestication (D)

Each of these 2 phases accounts for half of the entire process. Which gives a weighting of $\frac{1}{2}$ to each of them.

Within each phase, the sub-phases have the same weightings. Then:



$$I_q = 0.5 * (1/3 * C + 1/3 * N + 1/3 * S) + 0.5 * (1/2 * R + 1/2 * D)$$

With R being the ratio between the number (k) of countries that have ratified the instrument and the total number (T) of countries within the REC. **$R = k/T$**



**The sub-phase of domestication begins only when countries have reached the quorum of ratification allowing the entry into force of the instrument. So:

- $Iq = 0.5 * (1/3 * C + 1/3 * N + 1/3 * S) + 0.5 * (1/2 * k/T + 1/2 * p/T)$

- **Quantitative Indicators**

For these indicators which are already figures, a calculation method is used to harmonize all the numbers in the interval [0; 1]. The methods of harmonization are either standardization, calculation of the variability between the different countries of the REC or the calculation of ratio.

STEP 4: Calculation of the thresholds

The calculation of the thresholds follows the logic used in the calculation of the indicators. These thresholds are derived from the objectives and targets contained in Agenda 2063 and the Abuja Treaty. For a given indicator, the study looks for the objectives associated with it in key integration programmes. This goal is then divided into stages or it is equitably distributed over time to know what needs to be accomplished each year for the instrument or target to be achieved.

*** Threshold values can be found in Presentation 4 of the Workshop

STEP 5: Summary of the Calculation



- **Basic indicator I_k :** Qualitative or quantitative

$$I_{\text{qualitative}} = 0.5 * (1/3 * C + 1/3 * N + 1/3 * S) + 0.5 * (1/2 * k/T + 1/2 * p/T)$$

$I_{\text{quantitative}}$ according to a standardization

- **Sectoral index for each dimension**

$$ID = 1/n \sum_{k=0}^n I_k \quad 1/n \sum_{k=0}^n I_k, n \text{ is the number of indicators per dimension}$$

- **Regional Index for each REC**

$$IR = 1/d \sum_{k=0}^d ID \quad 1/d \sum_{k=0}^d ID, d \text{ is the number of dimensions that is 8 in this study.}$$

- **Continental index for the continent**

$$IR = 1/R \sum_{k=0}^R IR \quad 1/R \sum_{k=0}^R IR, R \text{ is the number of RECs on the continent that is 8.}$$



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