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AFRICAN SCIENCE, TECHNOLOGY AND INNOVATION INDICATORS (ASTII) INITIATIVE



TECHNICAL AND FINANCIAL REPORT ASTII PHASE 2 (2010-2014)



SWEDEN

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INNOVATION INDICATORS (ASTII) INITIATIVE



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ASTII PHASE 2
(2010-2014)



For further information about ASTII, contact
African Science, Technology and Innovation Indicators Initiative
NEPAD Science, Technology & Innovation Hub
NEPAD Planning and Coordinating Agency
C/o CSIR Building 10F
Meiring Naude Road,
Lynnwood, Pretoria
South Africa

Postal address: P O Box 395, Pretoria 0001, South Africa
Tel: +27 (12) 841 3904
Fax: +27 (12) 841 4414
Website: www.nepad.org

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LIST OF ACRONYMS AND ABBREVIATIONS

AAS	African Academy of Sciences
AIS	African Innovation Summit
AfDB	African Development Bank
AFRICALICS	African network for the economics of learning, innovation, and competence building systems
AIO	African Innovation Outlook
APHRI	African Population & Health Research Institute
AOSTI	African Observatory of Science, Technology and Innovation
AMCOST	African Ministerial Conference on Science and Technology
APRM	African Peer review Mechanism
ARIC	African Union Research and Innovation Council
ASTI	Agricultural Science and Technology Indicators
ASTII	African Science, Technology and Innovation Indicators
ATPS	African Technology Policy Studies (ATPS) Network
AUC	African Union Commission
CASTED	Chinese Academy of Science, Technology and Development
CeSTII	Centre for Science, Technology and Innovation Indicators
COMESA	Common Market for Eastern and Southern Africa
CPA	Africa's Science and Technology Consolidated Plan of Action
DST	Department of Science and Technology
ECCAS	Economic Community of Central African States
ECOWAS	Economic Community of West African States
GDP	Gross Domestic Product
GLOBELICS	Global network for the economics of learning, innovation, and competence building systems
GO-SPIN	Global Observatory on STI Policy Instruments
HSRC	Human Sciences Research Council of South Africa
IFPRI	International Food Policy Research Institute
MEIDE	Micro Evidence on Innovation in Developing Economies
MOU	Memorandum of Understanding
NEPAD OST	NEPAD Office of Science and Technology

NESTI	National Working Party on Science and Technology Indicators
NPCA	NEPAD Planning and Coordinating Authority
NSTIH	NEPAD Science Technology and Innovation Hub
OECD	Organization for Economic Cooperation and Development
R&D	Research and Experimental Development
REC	Regional Economic Community
RPI	Research Policy Institute
SACIDS	Southern African Centre for Infectious Disease Surveillance
SADC	Southern African Development Community
SAMCOST	SADC Ministerial Conference on Science and Technology
Sida	Swedish International Development Cooperation Agency
STI	Science, Technology and Innovation
STISA	Science, Technology and Innovation Strategy for Africa
UIS	UNESCO Institute for Statistics
UNU-MERIT	United Nations University - Maastricht Economic and Social Research Institute on Innovation and Technology
UNECA	United Nations Economic Commission for Africa
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNIDO	United Nations Industrial Development Organization
WIPO	World Intellectual Property Organization

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The African Science, Technology and Innovation Indicators (ASTII) Initiative has stimulated African Union (AU) Member States to start developing Science, Technology and Innovation (STI) indicators. It has enabled some countries to start conducting Research and Experimental Development (R&D) and innovation surveys and to build national capacities for indicators to inform STI policy formulation and review. AU Member States have made strides to create better knowledge and understanding of the value of STI indicators and are moving towards institutionalising ASTII through national focal points. We would like to acknowledge H.E. Dr Ibrahim Assane Mayaki, the CEO of the NEPAD Planning & Coordinating Agency (NPCA), for providing the leadership that has ensured that the ASTII initiative continues to fit into the mandate of the AU and is implemented in synergy with other programmes of the NPCA.

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The ASTII national focal points are pillars of the ASTII initiative. They coordinate ASTII implementation and spearhead the conduct of national surveys in their respective countries. They too are fully acknowledged. AU Member States that have invested resources in implementing the ASTII programme and in supporting the national focal points are commended and we encourage those AU Member States that have not yet moved in this direction to do likewise.

We acknowledge the collaboration with partner institutions for their tremendous contributions to the success of ASTII. In particular, we are indebted to the African Observatory for Science, Technology and Innovation (AOSTI) in Malabo, Equatorial Guinea, the Research Policy Institute (RPI) of the University of Lund and the United Nations Educational, Scientific and Cultural Organisation (UNESCO) Institute for Statistics (UIS) for sharing their experience on STI measurements in Organization for Economic Cooperation and Development (OECD) countries and in Africa. We are equally indebted to Centre for Science, Technology and Innovation Indicators (CeSTII) of the Human Sciences Research Council of South Africa for providing skills training to AU Member States and sharing experience of STI measurement in Africa. We cannot forget the contributions of experts from the Kenya National Bureau of Statistics (KNBS); the Uganda National Council for Science and Technology (UNCST); and the National Centre for Technology Management (NACETEM) in Nigeria in sharing their experiences on STI indicators with their peers on the ASTII project and in technical meetings. It is through this kind interaction and collaboration that Africa will be able to develop indigenous capabilities to address African STI-specific problems crucial for the socio-economic transformation of the continent.

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The ASTII initiative has benefited tremendously from the experience and knowledge of a group of STI experts who constitute the ASTII advisory Committee (AdCom). This group of experts not only played an advisory role but served as resource persons in various training workshops. The AdCom has played a pivotal role in assisting ASTII national focal points in overcoming the challenges encountered in conducting national surveys and analysing the results. The committee consists of the following eminent personalities: H.E Dr Ibrahim Assane Mayaki (NEPAD Agency CEO: Chair), Prof Aggrey Ambali (Head & Advisor, NSTIH); Dr Neo Molotja (Senior Research Specialist at CeSTII/HSRC); Dr Philippe Mawoko, Acting Director (AOSTI); Mrs Rosemary Uside-Kongani, Statistician at the Kenya National Bureau of Statistics (KNBS); Dr Willie Siyanbola, outgoing Director-General of the National Centre for Technology Management (NACETEM), Nigeria; Dr Hatem Mhenni (Independent Consultant); Prof Claes Brundenius (Honorary Professor at the Research Policy Institute [RPI] of the University of Lund); Prof Fred Gault (Professorial Fellow from UNU Maastricht Economic and Social Research Institute in Innovation and Technology [UNU-MERIT] and Professor at the Institute for Economic Research on Innovation at Tshwane University of Technology [IERI/TUT]); Mr Martin Schaaper (Programme Specialist and Head at the UNESCO Institute for Statistics [UIS]) and Prof Luke Mumba (ASTII Programme Coordinator). AdCom's invaluable contributions made ASTII 2 a success and we salute the members individually and collectively.

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EXECUTIVE SUMMARY

Measuring STI is important in order to develop national and regional science and innovation strategies and policies. The absence of such measurements serves as an obstacle for the design and implementation of STI policies especially in most African countries. It is therefore important for Africa to develop sustainable approaches for measuring STI based on a better understanding of national and regional innovation systems. It is in realization of the need to measure STI in the AU Member States that the African Ministerial Conference on Science and Technology (AMCOST) launched the African Science, Technology and Innovation Indicators (ASTII) Initiative in 2007.

Like the first Phase which operated from 2007-2010, the second phase of the ASTII Initiative was supported by the government of Sweden through the Swedish International Development Cooperation Agency (Sida). Phase-2 covered the period 1st July 2010 to 31st December 2013 with a four-month non-cost extension from 1st January to 30th April 2014. This phase was built on lessons learned and challenges of the first phase. Focus was on up-scaling the efforts in capacity building for conducting R&D and innovation surveys in the countries that participated in Phase I. The phase also focused on out-scaling to other countries that were not targeted during the first phase.

Several outputs have been achieved during the implementation of the ASTII-2 including: development of human and institutional capacity; ASTII data being credited as part of national statistics; partnerships built with other domestic and international programmes that support STI databases; STI status of African countries published in the African Innovation Outlook reports; and a coordinated mechanism for STI data established within the African Union system.

More specifically major achievements of ASTII-2 include the following:

- Seven skills training courses delivered with more than 300 experts from 35 countries trained in the conduct of R &D and Innovation surveys;
- At least 21 countries have acquired the capacity to conduct surveys and have produced core indicators which have been published in the African Innovation Outlook II (AIO-II) report of 2014.
- The number of countries joining the ASTII initiative has grown from 19 in Phase-1 to 35 in Phase-2;
- Allocation of US\$511,850 to 20 participating countries to support national surveys;
- Publication of three policy briefs which provide simplified, focused and specific messages to inform policy-makers on S&T and Innovation trends and practices;
- The commissioning of four research calls on national systems of innovation (NSI) to stimulate and support the development of STI processes in Member States of the African Union;
- ASTII provided both technical and financial support towards the establishment of the African Observatory for Science, Technology and Innovation (AOSTI) in Malabo, Equatorial

Guinea. The Observatory is a continental repository for science, technology and innovation statistics and a source of support for evidence-based policy making;

- Increasingly AU Member States are using information in the African Innovation Outlook reports in planning and monitoring the performance of STI programmes and are putting in place policies aimed at developing STI.

There have also been challenges encountered, including few countries have institutionalised STI data into their national statistics much as the number is now growing with time; STI is still not adequately prioritised as one of the main drivers of economic development in most of the regional economic communities and Member States; quality of data still varies greatly among Member States; lack of an electronic data platform for STI databases and low participation of the private sector in the R&D and innovation surveys.

1. BACKGROUND

1.1 Introduction

Science, technology and innovation (STI) are critical for Africa's development and progression from natural resource dependency to knowledge-based economies. The need to move from resource-based economies to knowledge-based economies is underscored by the fact that nations that are increasingly becoming wealthy are depending on the generation and application of knowledge rather than their natural resources. As such, investment in research and experimental development (R&D) remains key in the fight to eradicate poverty, mitigate and adapt to climate change, and promoting shared prosperity, inclusive growth, and sustainable development. In recognition of the need to invest in R&D, African governments through a number of assemblies of the African Union (AU) have committed themselves to invest at least 1% of their gross domestic product in R&D. Such calls for increased investment in R&D can be traced to the Monrovia Declaration of 1979, the Lagos Plan of Action (LPA) for the Economic Development of Africa (1980-2000), the Eighth Ordinary Session of the Executive Council of the AU that met in 2006 in Khartoum, Sudan and the Ninth Executive Council of the AU held in Addis Ababa, Ethiopia in 2007. These calls were based on the understanding that African countries were not investing enough resources in R&D and they lacked a framework to collect reliable data and monitor progress.

To help Member States monitor the total national investment in R&D, in 2005 in Dakar Senegal, the African Ministerial Conference on Science and Technology (AMCOST) adopted Africa's Science and Technology Consolidated Plan of Action (CPA)¹ as a framework to guide S&T development on the continent. Among its proposed projects, the CPA articulates the establishment of the African Science, Technology and Innovation Indicators (ASTII) Initiative. ASTII was established in September 2007. The same year, the Intergovernmental Committee on ASTII met in Maputo and resolved that African countries should apply internationally recognised mechanisms and guidelines to assess R&D and innovation programmes. The Organisation for Economic Development's (OECD) Frascati and the OECD/Eurostat Oslo Manuals were recommended as key points of reference in conducting surveys and developing standard indicators of STI in Africa.

1.2 ASTII Objectives

The goal of ASTII is to contribute towards better quality of STI policies at national, regional and continental levels. Its purpose is to support and strengthen Africa's capacity to develop and use STI indicators in development planning and policy. The specific objectives of ASTII are to:

- Establish African-based systems for collecting and analysing STI indicator data building on the experience gained during ASTII Phase I;
- Establish a harmonized African platform for publishing STI indicators data for AU Member States;

1 Both English and French versions of the CPA available on the then NEPAD office of Science and Technology website: www.nepadst.org/doclibrary/pdfs/ast_cpa_2007.pdf

- Enable AU Member States to utilise reliable and accurate information on STI for policy formulation and tracking commitments;
- Mobilize political support and create ownership of the ASTII programme;
- Provide an opportunity to the AU system and governments to compare and monitor the development of STI in the Member States.

1.3 History of Partnership with Sweden

From 2007 to 2014, the then NEPAD Secretariat and its successor, the NEPAD Agency, have been supported to a total of US\$6 million by the Swedish International Development Agency (Sida) to implement ASTII phases 1 (US\$2.9 million) and phase 2 (US\$3.1 million). These phases of the Initiative involved establishing a Coordination Unit at the NEPAD Secretariat, building partnerships with institutions within and outside the continent that are actively involved in collecting statistics, building national human and institutional capacity for collecting and analysing STI data, legitimizing STI data as part of national statistics, conducting surveys and publishing the African Innovation Outlook as elaborated in this report.

1.4 Situational Analysis of ASTII since 2007

The ASTII Initiative has focused on well-defined STI indicators for international comparison. The core indicators include²:

- Gross domestic expenditure on R&D (GERD by source of funds and Sector of performance)
- R&D Personnel by level of formal qualification and occupation, gender (headcount (HC) & full-time equivalent (FTE))
- Researchers by gender and field of study/research
- Outputs: publications, patents.

The Innovation surveys under the Initiative cover the following areas:

- Product (goods or services) innovation
- Process innovation
- Ongoing or abandoned innovation activities
- Innovation activities and expenditures
- Funding
- Sources of information and co-operation for innovation activities
- Effects of innovation during the last two years
- Factors hampering innovation activities

2 OECD (2002). Frascati Manual, Proposed Standard Practice for Surveys on Research and development, Paris: OECD

- Intellectual Property Rights
- Organizational and marketing innovations.

In addition to the core indicators listed above, participating countries have been encouraged to build indicator sets that address local needs and priorities.

After the first intergovernmental meeting held in Maputo in 2007, where African countries set the framework to measure STI activities in Africa and build related R&D and innovation indicators, the second intergovernmental meeting took place in Malabo in May 2012. At this second meeting, African countries expanded the scope of indicators to include exploratory studies on various aspects of STI. These aspects were grouped into the following six thematic areas: (i) building STI capacities; (ii) technology forecasting and prospecting; (iii) developing and managing STI Indicators; (iv) strengthening national innovation systems; (v) policy studies and (vi) policy outreach and advocacy. These thematic areas were endorsed by AMCOST V held in Brazzaville in 2012 and ultimately presented to the AU Summit as a programme of work for the next 5 years. The design of the proposed programme of AOSTI in terms of scope is based on these thematic areas.

1.5 Identification of participating countries on the ASTII Initiative

During the first phase of ASTII (2007-2010), the then NEPAD OST invited all AU Member States that had completed or were undertaking political and economic governance reviews under the auspices of the African Peer Review Mechanism (APRM), to submit statements of interest to participate in the STI surveys. The following 19 countries submitted their statements of interest: Algeria, Angola, Burkina Faso, Cameroon, Egypt, Ethiopia, Gabon, Ghana, Kenya, Lesotho, Malawi, Mali, Mozambique, Nigeria, Senegal, South Africa, Tanzania, Uganda and Zambia. Ministers responsible for Science and Technology of these countries were then invited to appoint national focal points based on criteria that were adopted at the Maputo meeting. The basis for recruiting the APRM countries was that the STI indicators would eventually be integrated into the APRM assessment instrument. During Phase-2 (2010-2014) the requirement to belong to the APRM was waived and more countries joined the initiative.

1.6 ASTII-2 Expected Outputs

The ASTII-II Programme Logical framework (Annex 1) provides the expected results in terms of outputs and outcomes. It also provides performance indicators, assumptions and targets. In brief the expected outputs can be summarised as follows:

- Internationally comparable STI Indicators adopted by at least 30 African Union Member States by 2013;
- A Flexible and robust ASTII Information system built and consolidated by 2013;
- Full R&D and Innovation surveys conducted in at least 10 AU Member States by 2013;
- At least 30 ASTII national focal points established and trained in ASTII Survey Framework by 2013;

- ASTII programmes established in at least two regional economic communities (RECs) secretariats by 2013;
- ASTII Monitoring and Evaluation (M&E) system developed and in use.

1.7 ASTII Expected Impacts

The ASTII Initiative was expected to yield the following impacts in different sectors of Africa's economy:

Impact on Policy formulation and implementation: It is expected that the evidence that the programme produces will support the development and management of science and technology (S&T) policies, and the assessment of R&D and innovation capabilities of the African continent.

Impact on the scientific community: Measuring R&D activities at the national and regional levels, and the new knowledge and skills generated as a result will provide evidence to advance interdisciplinary research especially within the NEPAD identified socio-economic sectors such as education, health, agriculture, energy, ICT, transport, climate change, etc.

Economic and social impact: Innovation indicators will provide useful indications on the sources of innovation, costs, drivers of innovation activities and their contribution to investments, production, marketing, profits and firm performance. Coupled with the indicators on education, the programme will provide direct input into the African Peer Review Mechanism (APRM) processes by enriching the current assessment instruments on governance of socio-economic development of the AU Member States.

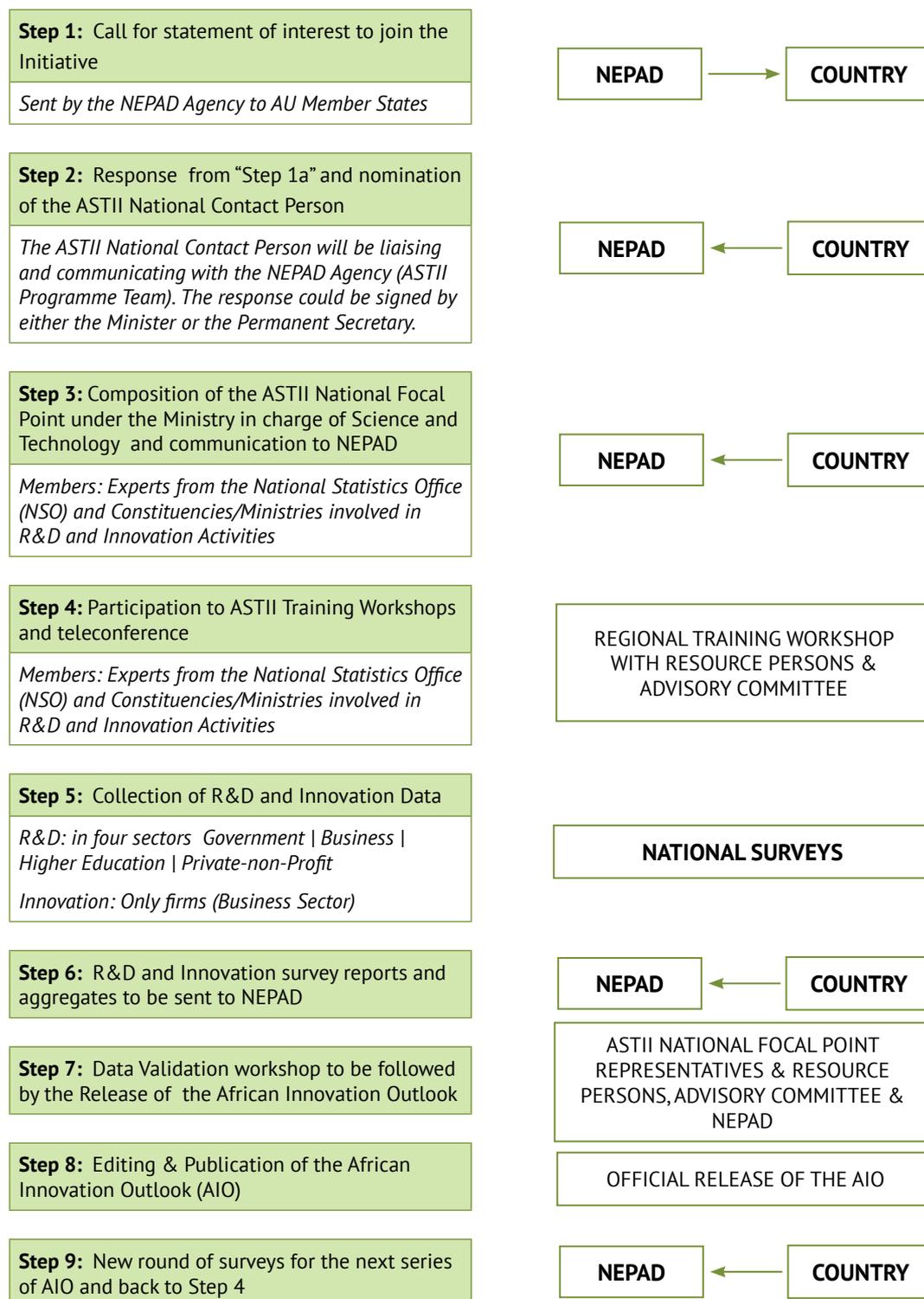
1.8 ASTII Institutional Arrangements

Implementation of the programme at the country level was managed by national focal points composed of experts drawn from both the Ministries responsible for Science and Technology and the National Statistical Offices. The focal points work under the coordination of the Ministry in charge of Science and Technology. The mechanism for coordination of ASTII is as illustrated in Figure 1. (ASTII Flow chart). The ASTII national focal points in the 35 countries are listed in Annex 2.

The ASTII National Focal Points are set up in a way to have the following features:

- be cross-sectoral, inter-ministerial and multidisciplinary in nature;
- have the ability to convene meetings of all relevant stakeholders;
- have legislative or at least administrative authority to collect or cause to be collected statistics and participate in national sectoral surveys of relevance to the ASTII initiative; and
- possess a critical mass of expertise for the development of STI indicators, or it should have ability to mobilize such expertise from the other institutions.

Figure 1: Flow chart of ASTII Processes



2. IMPLEMENTATION, PROGRESS AND ACHIEVEMENT OF ASTII-2

2.1 Scope of implementation

This report presents progress in the implementation of ASTII-2 covering the period 2010-2013 as well as the four months (Jan-April) non-cost extension in 2014. In order to achieve ASTII objectives, the following six interrelated activities were implemented namely, (1) supporting the ASTII Coordinating Office (ASTII Secretariat) mainly personnel costs; (2) Supporting national R & D and Innovation Surveys, (3) Capacity building on STI indicators; (4) Dissemination of ASTII information; (5) Promoting Evidence Best practices through continuous project M & E and an external evaluation; and (6) engaging technical services from the Research Policy Institute (RPI) at the University of Lund and other expert groups such as the South African Centre for STI Indicators (CeSTII), the UNESCO Institute for Statistics (UIS) and the African Observatory of STI (AOSTI); and Resource Mobilization. The sections that follow provide more details on the various programmatic activities undertaken in the period under review. The progress of ASTII-2 is measured against the ASTII-2 Programme Budget (Annex 3a), ASTII Work Plans 2013 and 2014 (Annex 3b & 3c) and the revised ASTII-2 logical framework for results-based management (Annex 1). A summary or overview of ASTII achievements is provided in Table 2.1.

2.2 Technical Support by ASTII Project Coordinating Office

The coordination of ASTII activities within AU Member States and in NPCA has been executed jointly by AOSTI and NEPAD/ASTII teams. NEPAD/ASTII focuses on capacity building and coordination of national & D and Innovation surveys. . For the period under review, the ASTII Project Coordinating Office (ASTII Secretariat) was composed of three full-time staff fully funded by the Swedish grant namely; one senior Officer (ASTII Coordinator), one Research Assistant, and one administrative Personal Assistant. The Secretariat continued to coordinate the implementation of the ASTII initiative by providing technical and administrative support to countries whose number has increased from 19 in Phase-1 to 35 in Phase-2. It worked very closely with National Focal Points in their efforts to conduct national surveys and submit data on R&D and Innovation indicators. Conference calls were employed on a regular basis to guide national focal points on various aspects of their R & D and Innovation surveys and to sort out contractual issues. The ASTII Initiative assisted Regional Economic Communities (RECs) S&T Desks in capacity building activities at regional level. The Secretariat produced ASTII Annual Work Plans and Budgets for the period 2010-2014 which were subsequently approved by Sweden and NEPAD for financing and implementation.

For the reporting period, the Secretariat organized 7 training workshops; and 304 experts were trained; 3 ASTII review meetings; 4 ASTII Technical Advisory Committee (AdCom) meetings, and 2 data validation workshops. The Secretariat also prepared and negotiated memoranda of understanding (MoUs) with international partners, contracts with AU Member States and consultancy contracts with service providers and with various experts/bidders in liaison with the NEPAD Agency (NPCA) Head Office. The work of the Coordinating Office has been supplemented by engaging consultants and experts to undertake specific tasks if and when required and also through collaboration with the AOSTI. In 2014 an intern was engaged by NPCA to support the ASTII team for three months. This was NPCA's contribution to the programme.

Table 2.1: An overview of ASTII-2 Achievements

Activity/Task	Implementation	Remarks
Personnel Costs	- Coordinator - Programme Research Assistant - Admin/Personal Assistant	Salaries based on AU contracts
Support national R & D and Innovation surveys	20 countries have been supported financially	\$511,850 paid out
3. Capacity building on STI indicators		
3.1 Training on R&D and Innovation Surveys	35 countries have participated in 7 different skills training workshops. More than 300 experts have been trained. On average many of these experts participated in at least two training sessions.	Demand for training from countries is increasing
	Training Workshops held one each for ECOWAS and ECCAS in 2013 Roadmap for collaborations with COMESA developed in 2013 and first NEPAD-COMESA Workshop on STI indicators was held in Nairobi 2013 Roadmap for collaboration with ECCAS developed in 2014 Preliminary discussions with SADC STI Desk held in 2011 and 2014	More still needs to be done to strengthen collaboration with RECS and to institutionalise ASTII
3.2 Support to STI Related Research calls	Four Research calls were selected for funding. At the time of this report three of the papers have been reviewed externally and two have been approved for publication	One research paper did not meet the grade
4. Dissemination of ASTII Information		
4.1 Building ASTIIWeb Platform	Consultancy Contract with SpecificXpects a Consultancy Firm in Namibia concluded in October 2013. Platform commissioned in April, 2014	ASTII Web-based database completed and operational (http://astii.eptadeka.com) Username: "user" (USER in lower case) No Password required
4.2 Production of AIO-II	AIO-II published in April 2014	Translation in French, launch and dissemination underway in May 2014.
4.3 Production of ASTII manuals	Draft R & D Guide has been produced by UIS. ASTII, AOSTI and National Focal points reviewed this Draft.	UIS to publish the Guide once it is approved.
4.4 Review of ASTII Survey Instruments	Both R&D and Innovation questionnaires under review in liaison with partners	On-going
4.5 Production of Policy Briefs	Three Policy briefs have been produced and translated from English into French. Dissemination is on-going	Dissemination on-going

Activity/Task	Implementation	Remarks
4.6 Production of ASTII Brochures	One Brochure (ASTII Guide) and one Newsletter produced	Dissemination on-going
5. Evidence on Best Practices		
5.1 M & E of Project	Internal programme monitoring and evaluation implemented on a continuous basis by the NPCA, NSTIH, Sweden and ASTII Secretariat. ASTII review meetings as part of a monitoring mechanism have also been held each year. ASTII AdCom and RPI also provided technical assistance and played the role of quality assurance	Done on a continuous basis up to the end of ASTI-2
5.2 External evaluation of Programme	One external evaluation conducted in 2011 for ASTII-1	External evaluation of ASTII II could be considered post April, 2014
6. RPI Services and Experts Group		
6.1 RPI services and Expert Group	RPI and Expert group services rendered as planned throughout ASTII-2	Services rendered as planned
7. Preparation of new proposal for funding		
7.1 Preparation of new proposal	Proposal developed with partners (AOSTI, UNECA) and submitted to Sida for review in June, 2013. Final re-submission to Sida made in October, 2013	Latest feedback is that ASTII-2 grant may be approved and first disbursement could be made by June 2014

2.3 Enlisting new countries

This is yet another area of success in ASTII-2. There has been a progressive increase in the number of participating countries from 19 in 2007-2010 to 28 in 2011-2012. This number rose to 35 by 2013 (Table 2.2). The outcomes of this phase included capacity building in STI indicators and related activities in 19 AU Member States Africa and production of the 1st African Innovation Outlook (AIO 2010) Report. The AIO 2010 outlined R&D, innovation and bibliometrics indicators (scientific productivity of AU Member States).

Table 2.2: AU Member States Participation over time

2007-2010	2012	2013
Algeria	Cape Verde*	Benin
Angola*	Equatorial Guinea	Botswana
Burkina Faso*	Liberia	Burundi
Cameroon	Mauritius	Chad
Egypt*	Namibia*	Congo
Ethiopia*	Niger	Congo, Dem. Rep.
Gabon*	Togo*	Rwanda
Ghana*	Tunisia	
Kenya*	Zimbabwe*	
Lesotho*		
Malawi*		
Mali*		
Mozambique*		
Nigeria*		
Senegal*		
South Africa*		
Tanzania*		
Uganda*		
Zambia*		

*Countries that have submitted data to the AIO-II

In Phase-2 letters were sent through the Office of the CEO to countries calling for their expression of interest to join the ASTII Initiative. Arising from this action a total of 16 new countries joined the ASTII initiative during Phase-2 representing 54% increase from 19 countries to 35. Informal expressions of interest to join ASTII have also been by Seychelles, Sudan and Swaziland. Core indicators reporting templates were sent out to the new countries and follow-ups were made on both old and new countries regarding the submission of data. Of the 35 countries participating in ASTII Phase-II, 21 (60%) conducted national surveys and have contributed data to the AIO-2 report of 2014. These figures are a confirmation of the growing demand by AU Member States for reliable indicators for strategic planning and monitoring of the state of STI and competitiveness of their economies. All 35 countries have participated in ASTII training workshops over the reporting period. Overall, the countries participating in ASTII have demonstrated high commitment to the objectives of the initiative which has accounted for the good progress that the programme has registered. The interest shown by countries is growing. For example, following the training workshop for the ECCAS region held in September 2013 in Brazzaville, a draft Ministerial Decision has been prepared for the establishment of the ASTII national focal point in the DRC. This Decision also provides for the nomination of eligible experts and institution to manage the focal point.

2.4 Human and institutional capacity at national level developed

One of the major achievements of the ASTII Initiative has been the building of capacities of Member States to collect and analyse data on STI. With the exception of South Africa and Tunisia, AU Member States did not have units established within their statistics systems that were dedicated to collecting data on STI. Since the inception of the ASTII Initiative, training programmes have been conducted to build capacity of Member States in data collection. The training has been facilitated by Member States that already had capacity with some support from partners. In this case, the Government of South Africa played an important role of committing its Centre of STI Indicators (CeSTII) to conduct tailor-made training programmes in the Southern Africa Development Community (SADC) Member States. For the other countries, training sessions were jointly facilitated by NEPAD Agency, OASTI, CeSTII, RPI Team and UIS.

A total of 7 training workshops were organized in Cameroon (2011), South Africa (2012), Egypt (2013), Rwanda (2013), Congo Brazzaville (2013), Burundi (2013) and Angola (2014). More than 300 experts have been trained in the following modules: (1) Methodologies for the measurement of Research and experimental development (R&D) and Innovation; (2) Understanding of R&D and Innovation definitions and concepts in relation to STI Indicators; (3) R&D and Innovation data collection and frameworks; (4) processing R&D and innovation survey data and analysis and dissemination; (5) Linkages between STI indicators, science policies and development. (See Annex 4 for details on training workshops and people trained). National experts in Malawi and Zimbabwe were trained under the auspices of CeSTII of South Africa. The training programmes were offered to staff from the Ministries responsible for science and technology and those responsible from national statistical offices. In addition, non-participating countries were often invited to the various ASTII training workshops in order to raise their awareness and interest about the Initiative.

Increasingly, a number of countries are requesting for follow-up in-country training courses and this has been arranged by the Secretariat. Other requests for training have come from Algeria, Namibia, Botswana, Cape Verde, and ECOWAS Commission.

ASTII training courses are tailored to fill specific skills gap that may be missing in a particular country. The major challenge though has been the high staff turn-over at the national focal points. This has necessitated that training of focal points should be an on-going activity throughout the lifespan of ASTII.

The capacity building efforts yielded a lot of benefits, among them, moving countries from a no STI data collection system status to one where countries are able to collect their own national statistics. A number of countries have acquired the capacity to collect, analyse, present and publish national R&D and Innovation survey reports. Egypt, Ethiopia, Ghana, Kenya, Nigeria and South Africa are among countries that have published national reports. Country reports from these countries form part of the broader African Innovation Outlook and also inform the national science, technology and innovation development and benchmarking. For example in Kenya, the new national science, technology and innovation strategy has been informed by the national innovation and R&D survey reports and the AIO-2010 report. See success stories in Box 1 for details.

Staff members of the ASTII Secretariat and of other related programmes of the NSTIH that work in close collaboration with ASTII have also been trained in indicators development and data analysis. Such training is required to build the capacity of NEPAD to coordinate, implement, monitor and ensure the quality of ASTII activities.

NSTIH Staff members together with UIS Resource persons at a training workshop in Rustenburg 28-30 May, 2013



Official opening of the 1st In-country ASTII Training Workshop in Kigali 7th to 9th August 2013 for Rwanda



Left to right: Prof Aggrey Ambali, Ms Maria Hakansson, Mr Remy Twiringiyimana and Prof. Marie Christine Gasingirwa

Participants at the Training workshop on R&D and Innovation data collection in Luanda, Angola 2-3 April, 2014



2.5 Supporting R & D and Innovation Surveys

2.5.1 Direct funding to countries

ASTII 2 provided funding to 20 countries out of the 35 countries participating in the Initiative to support the conduct of R&D and Innovation surveys. The selection of countries was based on expressed need and performance in Phase 1 and the submission of budgets and work-plans and audited reports in the case of second time recipient of grants. The grants were intended to supplement resources provided by the participating countries. The total amount disbursed to countries for the reporting period was approximately US\$511,850.00 out of the US\$575,000.00 contracted budget for this activity; constituting approximately 89% disbursement. The 11% not disbursed was mainly part of the 5% balances on the contracts which could not be disbursed on account that some countries were unable to submit external audit reports. This balance was redeployed to support activities for the non-cost extension as approved by Sweden. See breakdown of funding by country in Annex 5. In 2014, ASTII received more requests for financial support from Burkina Faso, Cape Verde, DR Congo, Malawi, Namibia and Rwanda. However, these requests could not be met due to the limited budget. These requests may be considered in future phases of the programme.

2.5.2 Processes for building regional STI data collection system

Regional Economic Communities (RECs) offer a lot of opportunities for building regional STI data systems as they are also strengthening their programmes in STI and education. ASTII's involvements with RECs have focussed mainly on assisting to build the requisite human and institutional capacity for STII. Discussions have been held around building systems for collecting and analysing regional STI statistics as well as developing regional observatories and STI desks. More specifically, in Phase-2 ASTII had the following engagements with RECs with varying degrees of intensity.

COMESA: ASTII has had two engagements with the COMESA S&T Office to map out research and technology initiatives and institutions in the COMESA region. A mapping exercise will provide baseline information on the actual status of National Innovation Systems (NISs) in the region. The information generated will help COMESA to facilitate the formation of regional research institutions networks and cooperation and to develop clusters to promote commercialization of S & T. These actions will enhance the contribution of STI to the economy of COMESA region. NEPAD/ASTII and COMESA have in principle committed to cooperate in the following areas:

- development of a regional strategy to foster innovation related to R&D;
- identification of research institutions in the COMESA region that have reached world-class level in terms of research achievements and their fields of specialization;
- creation of a database of science, medical, technical and engineering research institutions;
- creation of awareness among parliamentarians and specialised committees of Parliaments on the importance and utilization of STI in policy making; and
- adoption of Innovation ecosystem baseline survey tool and internationally comparable Innovation indicators measurement.

COMESA - NEPAD Workshop Mapping of Research & Innovation Initiative Institute, Silver Springs Hotel, 26-27 September 2014



It is perceived that such activities could also be undertaken with other RECs and engagements have commenced to this effect. ASTII convened a Consultative meeting of RECs and other Stakeholders in Nairobi from 24 to 25 September 2013 with following objectives: (i) to create awareness on the development, implementation and use of the ASTI and AOSTI Programmes; (ii) to assess and identify in which context ASTII can assist RECs in development and implementation of their STI strategies; (iii) and to scope other areas for long-term collaboration with NEPAD on STI indicators and STI policies in general. Due to unforeseen circumstances in Nairobi at the time, this event could not take place as many delegates failed to turn up.

ECCAS: Based on the interest expressed by the ECCAS Secretariat in 2012, training was conducted in September 2013 in Congo Brazzaville for the following countries: Cameroon, Chad, Congo, D.R. Congo, Gabon, and Equatorial Guinea. A follow-up meeting was convened at the ECCAS Secretariat in March 2014. One of the outcomes of this meeting was a roadmap which will culminate into the development of a broader STI Policy for the ECCAS region to include strategic areas such as STI Indicators; management of IPRs; Infrastructure; and Indigenous Knowledge Systems (IKS). Prospects for NEPAD support in establishing a S&T Desk at the ACCAS Secretariat were also discussed.

ECCAS training workshop on ASTII in Brazzaville 9-11 September, 2013. Officials in the picture include Hon. Itoua Minister of S&T Congo and Chair of AMCOST V Bureau, Deputy SG of ECCAS H.E Sangale, Country Directors, National Focal points and representatives of UIS and ASTII.



SADC: In July 2011, a meeting was held with Ms. Anneline Morgan from the Department of Science and Technology (South Africa) during which issues related to collaboration with SADC were discussed in view of DST's support to the SADC Science Desk. Subsequent follow ups were made with the then Desk

Officer at SADC. However due to staff redeployment at the time the engagement did not proceed beyond this point. A second discussion was held in April 2014 with Ms Anneline Morgan, the new SADC S&T Officer. She committed to facilitate collaboration between NEPAD ASTII and the SADC Statistics Unit so that STI indicators become an integral part of SADC Secretariat Statistics. This will need further follow-up in the next phase.

Participants at a SADC Experts meeting held at the Department of Science and Technology Pretoria 8-11 April, 2014



ECOWAS: Through contacts established during the meeting of the Second Committee on Development Information Science and Technology (CODIST II) in May 2011, the then Interim ASTII Coordinator attended and made a presentation at the ECOWAS Conference of Ministers for Science and Technology in March 2012. The conference adopted a regional STI policy and subsequently the ECOWAS Secretariat expressed interest and commitment to work with the NPCA on expanding the ASTII Initiative to all their Member States. The NEPAD Agency invited and co-funded the ECOWAS desk officer's participation in the ASTII workshop in April 2012 in Cape Town, South Africa as a way of enhancing their understanding of the Initiative. The ASTII team participated in a planning workshop for Science Technology and Innovation (STI) Indicators organized by the Economic Community of West African States (ECOWAS) Commission in Lomé, Togo, from 1-4 September 2012. The workshop was a direct result of the NEPAD Agency's engagement with the ECOWAS Commission on the issue of STI indicators and led to the development of a roadmap on STI indicators for the region. ASTII has also trained some West African Member States in producing indicators to guide evidence-based policies. Following tripartite discussions between ASTII, AOSTI and the ECOWAS Commission, a training workshop for ECOWAS region has been scheduled for 10-15 May 2014 in Abidjan, Ivory Coast. Countries invited to this training workshop are: Benin, Burkina Faso, Cape Verde, Ivory Coast, Gambia, Ghana, Guinea, Guinea Bissau, Liberia, Mali, Niger, Nigeria, Senegal, Sierra Leone and Togo.

ASTII has initiated the processes for building regional STI data collection system and any future ASTII initiatives should try to build on these initial contacts with RECs.

2.6 Partnerships between ASTII Initiative and other programmes

The ASTII Initiative which took off with initial partnership between the then NEPAD Secretariat and the Research Policy Institute (RPI) at the University of Lund has over the years of implementation seen several partners coming to join. The NEPAD Agency and the AOSTI have collaborated with the following institutions on the Initiative: OECD Working Party of national Experts on STI (NESTI), UNESCO-Paris, United Nations Economic Commission for Africa (UNECA), International Food Policy Research Institute (IFPRI), African Development Bank (AfDB), African Academy of Sciences (AAS), and African Technology Policy Studies Network (ATPS), etc. (Table 2.3).

Table 2.3: ASTII Partnerships and Collaborations

Area of collaboration	Partners	Functions – Activities - Areas
Training of Member States	Chinese Academy of Science and Technology for Development (CASTED)	Training of Member States under the UNESCO Category 2 Center in China
	AOSTI, CeSTII, RPI and UIS	ASTII regional and in-country training workshops
International STI Frameworks (Frascati & Oslo Manuals & Annexes)	NESTI/OECD	ASTII Collaborated in the development of the Annex and the draft 7 th edition of Frascati Manual
Teaching materials	AOSTI, CeSTII, RPI and UIS	Development of teaching modules
Technical Advisory Committee	AOSTI, CeSTII, RPI, UIS, Kenya, Nigeria and Egypt	Provides overall technical assistance/advice to ASTII
Data collection, validation and production	AOSTI, ASTI/IFPRI, CeSTII, RPI and UIS	Collecting, validating and production of country surveys, the African Innovation Outlook series and other ASTII publications
Support CPA implementation	AfDB, UNECA and UNESCO	Advocacy of CPA flagship programmes (ASTII included) and awareness creation
Knowledge production on R&D and Innovation	AAS, AFRICALICS, ATPS, GLOBELICS, MEIDE (UNU-MERIT) and GO-SPIN (UNESCO-Paris)	Advocacy on R&D and Innovation indicators and related publications
	UNIDO	Co-analysis of ASTII data for publications, dissemination, postgraduate training, data collection and databases

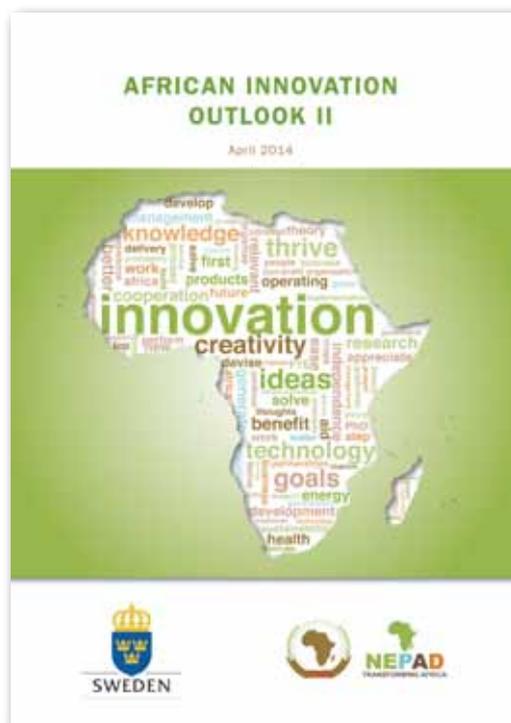
Many of the partners supported ASTII in development of training modules, undertaking regional and in-country training, hosting of focal points at their centres, and promotion and advocacy for the ASTII agenda. ASTII and its partners have also contributed to the development of the international STI measurement frameworks. Details on the nature of the collaboration with each of these institutions are provided in Annex 6. It is anticipated that during the new Phase of ASTII which is proposed in Section 2.12.3, collaborations will be developed with other partners such as Globalics, Africalics and African Population & Health Research Institute (APHRI).

2.7 Dissemination of ASTII Information

Dissemination of STI indicators is important within and beyond the countries that are participating in the ASTII Initiative in order to create awareness and generate interest in the value of indicators on the continent. Dissemination of information on ASTII has generated significant interest among AU Member States resulting in the increased requests from countries to participate in the ASTII Initiative. Dissemination has also helped to secure political buy-in at government level, to raise wider public awareness at grassroots level, and to garner support from key stakeholder groups. This has been demonstrated by the number of AU Member States that co-funded or fully financed their R&D and Innovation national surveys.

Dissemination of ASTII information has been achieved through various channels including publications, conferences, workshops and media briefings in order to promote awareness of its activities and to showcase its outcomes. In terms of publications, ASTII has produced African Innovation Outlook (AIO)³ reports, policy briefs, special research papers, brochures, peer-review journal articles and newsletters. These publications are also publicly available online.

2.7.1 African Innovation Outlook Reports



The release of the AIO is linked to the R&D and Innovation national surveys which are undertaken by AU Member States. Out of the 19 countries that participated in ASTII Phase-1, 17 submitted data which was published in the first ever African Innovation Outlook report 2010. This report provided evidence on the state of science, technology and innovation in the surveyed countries and generated significant debate and interest in STI indicators. The debate has contributed to the design of solutions to African problems and has influenced the work on STI indicators on the continent. More than 1000 print copies have been disseminated and the Outlook is also available for download online.

Out of the 35 countries participating on ASTII-2, 21 have submitted data to be published in the second AIO report of 2014 with the following breakdown: Twenty-one (21) countries have conducted R&D surveys, namely: Angola, Burkina Faso, Cape Verde, Egypt, Ethiopia, Gabon, Ghana, Kenya, Lesotho,

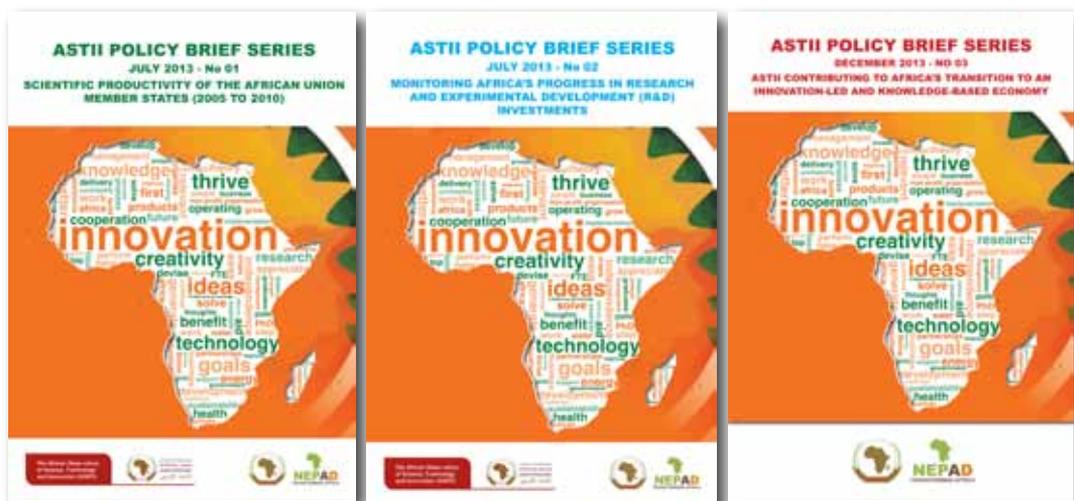
³ Both the main report (AIO-2010) and the Executive summary are on the NEPAD website: www.nepad.org/system/files/june2011_NEPAD_AIO_2010_English.pdf?; www.nepad.org/system/files/NEPAD_AIO_Executive_Summary_web.pdf.

Malawi, Mali, Mozambique, Namibia, Nigeria, Senegal, South Africa, Tanzania, Togo, Uganda, Zambia and Zimbabwe. Fourteen (14) countries have conducted Innovation Surveys, namely: Egypt, Ethiopia, Ghana, Kenya, Lesotho, Malawi, Mali, Mozambique, Nigeria, Senegal, South Africa, Tanzania, Uganda and Zambia.

A Validation Workshop was held in Cairo Egypt on 13-15 February 2013 where summaries and aggregates of STI micro-data, collected in a systematic way by African institutions, were presented. From this workshop, data collected by the countries were scrutinized by the ASTII Advisory Committee (AdCom) and advice on how to improve data quality was provided.

On 25th February, 2013 NEPAD awarded the Human Sciences Research Council/Centre for Science, Technology and Innovation Indicators (HSRC/CeSTII) of South Africa a 5-months contract up to 25th July to author the AIO-2 Report. This was done through the NEPAD procurement procedures. The duration of the contract with CeSTII was extended from 25th July to 26th November, 2013. By end October 2013 CeSTII submitted the first Draft of the AIO-2 Report to NEPAD. Thereafter a validation workshop of experts to review this Draft took place on 11-13 November, 2013 in Cape Town. Since getting the contract, CeSTII engaged with national focal points and the ASTII Secretariat to follow-up on outstanding data from countries. Members of the AdCom met again in May 2013 in Cape Town to analyze the data that countries had submitted to CeSTII. Following a round of reviews by the AdCom and comments from Sweden, in March 2014 the NEPAD Agency approved the AIO-II. As of the date of reporting, the AIO-II report has been published. Translation, launch and dissemination of the Outlook will follow thereafter. A total of 1000 copies will be produced in English and French.

2.7.2 Policy briefs



One of the objectives of ASTII is to provide policy recommendations on the development of STI in Africa. ASTII produced three policy briefs focusing on: (1) 1% GDP contribution target (History, current state in Africa and policy recommendations to countries to reach 1% GDP); (2) Scientific production of the African Union (Salient findings from the bibliometrics project, policy recommendations to increase scientific production and visibility); (3) ASTII Contributing to Africa's Transition to an Innovation-led and

Knowledge-based Economy. These policy briefs⁴, provide simplified, focussed and specific messages to inform policy-makers on S&T and Innovation trends and practices. More than 1000 copies of each policy brief were produced in English and French and disseminated widely.

2.7.3 Building ASTII web platform

The development of a Web Portal & Information System on STI indicators was re-assigned to AOSTI following the 1st ASTII review meeting held in 2011 because of cost implications. It was determined that the current ASTII budget would not be adequate for such an undertaking. In turn, AOSTI commissioned a feasibility study on establishing this information system in collaboration with the International Telecommunication Union (ITU). The full Report and cost implications have been published. The project has three work packages to be developed and finalized by 2016. The total budget is USD1.5 Million.

In the meantime, while the main data system to be hosted by AOSTI is still evolving, the 2nd ASTII review meeting decided that an in-house mini data storage facility should be established. This will help to keep secure the ASTII Phase-1 and 2 aggregate data from countries. It was noted that currently all the data were kept in excel files at ASTII on a laptop while the raw data are retained by the national focal points in countries as per requirements of the Statistics Charter on Confidentiality. These survey data from AU Member States needed to be compiled and consolidated in a well-structured and accessible mini web-based database. The mini database will make it possible for the public to have access to indicators released since the launch of the ASTII Initiative in 2007.

In July 2013, NEPAD published a call for a consultancy to undertake the task of developing the expected information management system and/or database. The tasks for the consultant were as follows:

- Development of an ASTII Web-based mini-information management system;
- Technical recommendations on the purchase of compatible and robust IT equipment for archiving and storage of R&D/Innovation indicators;
- Training of NEPAD/ASTII team to sustain in-house information management system administration;
- A 3- year maintenance plan.

The consultancy contract was awarded to SpecificXperts Investments of Namibia in October 2013 for the period 14th October-13th December, 2013. A mini ASTII We-based platform to be linked to the robust AOSTI web-platform has been designed and was completed by April 2014. The database is now operational and can be accessed on <http://astii.eptadeka.com>. USERNAME: "user" (USER in small letters). No password required. To facilitate daily management of this database, hardware and software have been procured with a contract for in-house IT support for database maintenance and STI outreach. This facility will be housed within the NSTIH.

4 The ASTII Policy brief series already have three products released in 2013: (a) Scientific productivity of the African Union member States : 2005-2010; and (b) Monitoring Africa's progress in Research and Experimental Development (R&D) investments and (c) ASTII Contributing to Africa's Translation to an Innovation-led and Knowledge-based Economy. The Link on the AOSTI website is <http://aosti/index.php/policy-briefs>

2.7.4 Research on Measuring and Utilisation of STI Indicators

This activity was aimed at improving the availability of measurements of STI activities taking place in Africa. There are several research activities taking place in African universities, research institutions and private business entities and yet uptake of results especially from universities and public research institutions is low. To address this problem there is need for evidence-based studies that could influence policies at various levels of African leadership. It is was decided that a joint NEPAD Agency-Sida call should be run to support studies that would feed into informing policy on uptake of research and innovation results into national development agenda. The ASTII data being collected also provides an opportunity for such studies to analyze the data and provide policy recommendations on development of science, technology and innovation in Africa.

The concept and terms of reference (ToRs) for the research call were developed jointly by RPI and the NEPAD Agency and the call was launched in February 2011. When the call closed in March 2011 a total of 14 submissions had been received. A panel of expert reviewers was assembled and 4 proposals were selected for awarding of grants as follows:

1. "Assessment of Evidence of Literacy Level of Policy Makers in the Utilization of STI Indicators in the Policy-Making Process in Nigeria";
2. "A Comparative Analysis of the Use and Influence of Science, Technology and Innovation Indicators on Policy Formulation and Implementation in Malawi and South Africa";
3. "Analysis of Science and Technology Policy: What Relevance for a Successful Innovation System in Senegal";
4. "Examining Successes and Challenges of Using STI Indicators to Measure Innovation in Smallholder Agriculture and Non-Agricultural Informal Sector: The Case of Malawi".

The grant agreements were finalized and awarded two years later in June 2013. The maximum award per grant was \$20,000. As of April 2014 the status is that the first paper is in print; the second one is undergoing external reviews; the third paper is in its final stages of preparation. The output on the fourth paper was found to be unsatisfactory following two rounds external reviews and the contract on this paper was therefore terminated.

2.8 Review of R&D Guide and ASTII Standard Questionnaires

2.8.1 Development of New R&D Survey Guide

The initial plan under this activity was for ASTII to produce its own guide on the conduct of R & D and Innovation Surveys. Experience from the first phase had shown that the generic guidelines provided in Maputo in 2007 were not adequate as the ASTII programme implementation unfolded under different circumstances at the national level. As such Phase-2 was to develop a series of African Indicators manuals to guide the conduct of surveys, make it easier to communicate the accepted concepts, definitions and methods for the collection, analysis, interpretation, and the use of the ASTII data. It was felt that such a series of Manuals will support the publication of statistics and serve as a guide for other related publications. This matter was reviewed at the second ASTII Advisory Committee meeting held in Cape

Town on 27th April 2012 which noted that UNESCO had already prepared an R & D Survey Guide which could be adopted by ASTII and AOSTI. It was therefore suggested that NEPAD could focus on developing a manual on Innovation. Subsequent discussions between NEPAD and AOSTI and in line with the harmonization agenda between the two, it was decided that this task will be undertaken in collaboration with AOSTI.

During the period under review ASTII worked with UNESCO to fast-track the adoption of the UNESCO R & D Survey Guide. On 5-6 August, 2013 ASTII convened an expert Group meeting of National Focal Points from Kenya, Nigeria, South Africa, and Uganda in Kigali, Rwanda to review the draft Guide. Others in attendance at this meeting were CeSTII, UIS, AOSTI, the Head of the NSTIH and ASTII Secretariat. In making their inputs to this Guide, the Experts noted that the Guide had incorporated materials from the ASTII Initiative such as the ASTII R&D Questionnaires and was therefore a good document. The inputs from the experts were compiled and submitted to UIS for further refinement of the Guide to be adopted by ASTII once it is finalized by UIS. The Guide is currently in its final stages of approval by UNESCO.

2.8.2 Review of ASTII R&D & Innovation Questionnaires

The internal review of R&D questionnaire to take into consideration the new International Standard Classification of Education (ISCED 2011) which was adopted in 2012 is work in progress. Both UIS and ASTII have also agreed to implement the new standards that will be contained in 7th edition of the Frascati Manual once the new manual is approved by the NESTI/OECD meeting in Paris in June 2014.

On Innovation, both UIS and ASTII have harmonized the questionnaire for business enterprises.

2.9 A coordination mechanism for STI data between NEPAD and AOSTI

A coordination mechanism of STI data between NEPAD and AOSTI has been developed. The NEPAD Agency and the AUC have worked together over the years to build a core team that has coordinated the ASTII Initiative. The team was initially build at the NEPAD Secretariat and since two years ago another team has been established in Malabo, Equatorial Guinea, following the support provided by the Government of Equatorial Guinea and the AU Summit decision to establish AOSTI. The ASTII Initiative has played a pivotal role in ensuring that the AOSTI takes off by providing technical support. With the establishment of NSTIH, the two teams have built a strong working relationship where they are implementing the activities together. This is also in line with the decision of the 1st Bureau meeting of AMCOST IV held in in Addis Ababa. May 2012

2.10 Evidence on best practices

2.10.1 Internal Monitoring and Evaluation (M&E)

Internal M&E is done at the NPCA global level and annual reports (including ASTII) are submitted to the AU Summit as feedback on implementation of approved programmes and budgets of the NEPAD Agency. In addition, the M&E component in the ASTII-2 budget provides for internal monitoring of the programme. The NSTIH and ASTII Secretariat have done most of the internal M&E through country visits,

regular teleconferences/conference calls with national focal points, monitoring country work plans and executing the ASTII logical framework. The revised ASTII-2 Logical frame for results-based management (Annex 1) provides a guide for M&E in terms of the specific objectives, accompanying activities, outcomes, outputs and impacts areas.

2.10.2 ASTII Annual Review Meetings

As part of internal M&E mechanism, a total of three ASTII annual review meetings have been held one each in 2011, 2013 and 2014. The meetings have been attended by Sweden, NSTIH, AOSTI and the ASTII Secretariat. These meetings have reviewed ASTII progress, approved work plans and budgets for implementation. The 3rd meeting of 2014 took place at the Swedish Embassy in Nairobi on 19-20 February, 2014. Among others, the meeting received and approved the interim technical and financial reports on ASTII-2 for the period 2010-2013. The meeting also commended NEPAD Agency for the quality of the reports and the level of achievements on the various deliverables. It also considered the draft AIO-2 report and suggested some corrections which were subsequently attended to. The 3rd ASTII Review Meeting also approved the non-cost extension of ASTII for 4-months from January-April 2014 and the associated Work Plan and Budget (Annex 3c). The interim ASTII-2 report (Technical and financial) has been updated in this Final ASTII-2 Report (2010-2014) to include activities implemented in the non-cost extension period.

2.10.3 External Evaluation

During the 1st ASTII Review Meeting in 2011, it was requested to combine the budgets for internal M&E and external evaluation to fund one external evaluation. External evaluation covering activities carried out during ASTII-1 was conducted during Phase-2 in 2011 by a consultant firm, Science Innovation Policies Studies (SIPS) from Pretoria, South Africa. In total thirteen recommendations came out of this evaluation. NEPAD/ASTII took actions on the various recommendations. Subsequently the actions were considered and approved by the 2nd ASTII Review Meeting held in Pretoria in January 2013. See Annex 7 for details.

For ASTII-2, it is recommended to conduct an external evaluation towards the end of the current Phase in May-June 2014. Such an evaluation will better reflect challenges faced by both NEPAD and AU Member States in conducting the second round of surveys and the lessons learned in producing the 2nd edition of the AIO. However, this is subject to budget considerations as ASTII-2 had no provision for an external evaluation.

2.11 Expert Groups and RPI Services

2.11.1 The Expert group

In view of the complexities of the STI systems, the implementation of the ASTII Initiative needs to be well advised in order to achieve the desired outputs. A technical Advisory Committee was established in 2011. The Committee consists of selected experts with experience in STI with a mandate to provide practical and informed advice to the ASTII Initiative. The group was first called the ASTII faculty when the Initiative was launched in 2007.

Prof Demetre Labadarios (CeSTII), Prof. Claes Brundenius (RPI) and Prof. Fred Gault (RPI,UNU-Merit and IERI/TUT) at CeSTII



The technical committee contributes to a better understanding of the STI contents which are relevant to governing science, technology and innovation policy in Africa. It advises on statistical methodologies and applications upon which relevant STI Indicators are constructed. Through various panels, workshops, meetings etc., the Committee assists in capacity development of STI stakeholders and stimulates debate on emerging areas of innovation and development.

In addition to the provision of expert advice across a number of subject matter areas there has, since the first phase of the ASTII initiative, been an additional function within the Technical Advisory Committee which is that of quality assurance managed by the Research Policy Institute (RPI) at the University of Lund, Sweden. RPI has also provided a liaison function with the funding agency, Sida. In order to cut costs, the AdCom meets after each main ASTII meeting such as data validations or after training workshops of Member States.

Retreat on ASTII with AOSTI, HSRC/CeSTII, NEPAD/ASTII, Science-Metrix (Canada), AAS and ASTII National Experts (Kenya & Cameroon) held in Pretoria, 17-21 December, 2012



In 2011 in Yaoundé, Cameroon, the AdCom agreed on the following policy matters: (i) African experts to play a leading role in producing future editions of the AIO; ii) identified a need to produce an R & D Survey Guide which will reflect the Frascati manual to help countries to better conduct R&D surveys in and beyond Africa.

October 2011 was also the first meeting of the newly established AdCom, replacing the ASTII faculty. Among other things for the reporting period the committee discussed and agreed on the following: i) Work-plan for 2012, ii) ASTII Research Call; iii) Funding support to countries; iv) Evaluation of Phase 1; v) Roadmap to AIO-2013 with joint data collection with UNESCO, vi) authoring and editorial process with and by Africans, and vii) the validation workshop; viii) Sustainability & future of ASTII: mainly the planning for ASTII Phase-3, focus & approach; Collaboration with AOSTI; Survey cycles and future versions of the Outlook.

2.11.2 Research Policy Institute (RPI)–University of Lund

The Research Policy Institute (RPI) at Lund University, Sweden, has since 2007 served as advisor to the ASTII Initiative, providing expertise and quality control in the process. Expertise from RPI has been especially appreciated in training workshops which are organized by NEPAD for participating countries. RPI played an important role in the production of the AIO reports, policy briefs and in reviewing various other ASTII publications. RPI experts also serve as members of the ASTII Technical Advisory Committee.

The RPI team is not only composed by senior persons involved in the business of R&D and Innovation with OECD countries but also a former Chairman of the OECD Working Party of National Experts on Science and Technology Indicators (OECD/NESTI). Most of the team members have more than 20 years' experience with STI indicators in OECD. These experts are devoting their time to support Africa to develop capacities for STI indicators.

- The following cover some of RPI contributions to ASTII:
- Collaborated with ASTII to provide technical support and to build capacity in ASTII national focal points;
- Collaborated with - ASTII in reviewing the Draft of AIO-2;
- Provided technical support to ASTII in reviewing the Draft Policy briefs;
- Participated in meetings of the AdCom;
- Participated in building capacity at the NSTIH through provision of short-term training; Provided technical support in reviewing Reports from the research calls;
- Collaborated with ASTII and AOSTI in developing a new proposal for ASTII-3;
- Collaborated with NEPAD Agency ASTII Programme in the adoption of the Draft Guide for R&D Indicator surveys prepared by UIS;
- Provided technical back stopping to the South African Centre for Science, Technology and Innovation Indicators (CeSTII) and NEPAD Agency in the authoring of the R & D and Innovation Chapters of the AIO-2.

2.12 Resource Mobilization

2.12.1 Domestic Resource Mobilization

The absence of ASTII related budget lines in national budget as well as the lack of alternative financial support at the national level (mainly private sector) remains one of the major challenges in sustaining the ASTII Initiative. Some countries have dedicated budgets for the conduct of STI surveys (e.g., Kenya, Nigeria and South Africa).

Efforts were made to compile data on national financial investments on national surveys but only 7 ASTII national focal points were able to provide this information (Table 2.4). In many cases information on funding to ASTII was not readily available.

The Ministry of S&T of Angola has also financed its national surveys in 2012 from domestic resources although figures were not available at the time of reporting.

Table 2.4: Contributions from some AU Member States to R&D and Innovation Surveys in ASTII-2

AU Member States	Amount	Equivalence in US dollars
Ethiopia	ETB 129,000.00	USD 7,095.00
Kenya	KES 21,440,000	USD 252,247.00
Lesotho	ZAR 60,000 (old exchange rate ZAR8.5 =USD1)	USD 7,058.00
Malawi	MK 1,237,500	USD 7,500.00
Mali*		USD 10,055.00
Tanzania*		USD 35,082.18
Togo	XOF 2,500,000	USD 5,000.00

ETB: Ethiopian Birr; MK: Malawi Kwacha; XOF: BCEAO Franc;

ZAR: South African Rand; (*) Submitted the amount of national contribution only in US dollars.

2.12.2 AU internal fundraising strategy: STISA -2024

Another opportunity for resource mobilization lies in ASTII operating jointly with the African Observatory of Science, Technology and Innovation (AOSTI). This avenue for supporting ASTII is feasible through the new AU STI Strategy for Africa (STISA-2024) which was endorsed at the 13-18 April 2014 Extraordinary Meeting of AMCOST V in Congo Brazzaville. STISA-2024 offers possibilities for NEPAD/ASTII and AUC/AOSTI to plan for a new mechanism to sustain the measurement of STI indicators on the continent. STISA-2024 provides that: (1) NEPAD Agency, AOSTI and ARIC will identify a minimum set of agreed targets and performance indicators; (2) NEPAD Agency and AOSTI will track performance indicators; (3) each Member State and regional STI and ICT programmes will incorporate a standard M&E evaluation system.

Clearly, it is the expectations within STISA-2024 that STI data collection, capacity building and other M&E related activities will continue as core strategic programmes of the AU through NEPAD/ASTII and AUC/AOSTI.

2.12.3 ASTII-3 Proposal Developed to Sweden

At the 2nd ASTII review meeting held in Pretoria, South Africa, on 21-22 January 2013 and also at a follow-up meeting on 26th February 2013 at the Swedish Embassy in Addis Ababa, Sweden reiterated its desire to support the third phase of the programme starting from 2014. This required the NEPAD Agency to submit a proposal which should be received before end of June 2013. The focus in the follow up phase should be on building the capacity of the NEPAD Agency to analyze the data and draw inferences that will inform policy as well as guide Member States in their investments in STI. Sida also encouraged NEPAD to collaborate with UNECA and AOSTI on the analysis and interpretation of the data being collected through the ASTII programme. In addition, the two institutions should explore possibilities of adding new parameters to the survey instruments in order to effectively inform national and regional policy process on matters of science, technology and innovation; education and trade.

Following this discussion the NEPAD Agency with its partners, UNECA and AOSTI, started a process of developing a joint ASTII-3 proposal. The first proposal development workshop was held in Cape Town, South Africa on 6-11 May 2013. The output of this workshop was a proposal which was submitted to Sida on 15 June 2013. In August, Sida provided reviewers' comments which were addressed at a second meeting of the proposal drafting team held in Rustenburg, South Africa on 17-20 September 2013. The final proposal consisting of the following Work Packages (WP) was resubmitted to Sida in October 2013:

- WP1:** Development of a continental data and information management system at the African Observatory on Science, Technology and Innovation (AOSTI);
- WP2:** Strengthening national and regional processes for conducting national and regional data collection, analysis and management systems for R&D and innovation indicators;
- WP3:** Measuring the contribution of STI to Africa's development: beyond the current innovation and R&D metrics;
- WP4:** Integration of STI and education indicators into the economic Development assessment instrument of the African Peer Review Mechanism.

Feedback received at the 3rd ASTII Review Meeting of 19-20 February, 2014 held in Nairobi was that internal processes for consideration of the proposal in Sweden had reached an advanced stage. Overall indications were that funding for ASTII-3 would be approved after which the new phase would commence in June 2014.

2.12.4 Consultations with partners for co-funding

NEPAD/ASTII programme is in discussions with both the Government of Angola and the African Development Bank (AfDB) office in Mozambique to explore new opportunities for supporting Portuguese speaking countries through in-country training workshops. Preliminary discussions have also been held

in March 2014 in South Africa with the Senior Advisor to the Deputy Secretary General of UNIDO to scope areas for collaboration with ASTII. The following areas were identified: (1) co-analysis of ASTII data for further publications; (2) dissemination of ASTII data; (3) design of a postgraduate programme for PhD/MSc students to use ASTII data; (4) ASTII data collection to be strengthened; and (5) ASTII databases to be made robust. Follow-up on these discussions will be made during ASTII-3.

3 OTHER ASTII RELATED NETWORKING ACTIVITIES

The ASTII Secretariat and the NSTIH have participated in several ASTII related networking conferences/workshops/meetings and events as summarized in Table 3 below.

Table 3: Summary of other ASTII related networking activities

	Event(s)	Who	Venue & Dates	Outcomes
1	UNESCO Global Observatory on STI Policy Instruments (Go-Spin) Training Workshops	PC, RA & PA	Harare: 7-8/11/2013 Dakar: 12-14/03/2013 Maputo: 17-19/06/2013	ASTII will collaborate with AOSTI and UNESCO to implement GO-SPIN in Africa. Discussed M&E tools (Indicators) for STI Policies with MPs and other government officials from Lusophone countries
2	WIPO Experts Meeting on IPRs	PC & RA	Geneva, Switzerland 3-4/12/2013	IPRs country studies including one from Africa (Egypt) reviewed, potential areas for collaboration with WIPO identified Follow-up to be made in 2014
3	Meetings of the High Level Panel on Review of CPA	PC	April-August 2013	New Science, Technology and Innovation Strategy for Africa (STISA-2024) adopted by AMCOST V as successor to CPA. NPCA and AOSTI to monitor indicators for the new strategy.
4	ASTI/IFPRI technical review workshops on the next ASTI phase in order to strengthen regional cooperation in line with NEPAD/ASTII activities	PC	Kampala: 16-17 Oct, Anglophone countries & Dakar 20-24 Oct- Francophone countries	Review of previous surveys carried out by ASTI/IFPRI focal Points on STI indicators in Agriculture. Joint data collection with ASTII discussed. Follow-up to be made in 2014.
5	The World Academy of Sciences Conference, Theme: on "Challenges & Opportunities in S&T in Developing Countries"	PC	Bangalore, India: 21-23 Nov 2013	Experiences on challenges shared with other developing countries on STI in general and indicators in particular.
6	1st In-house Training Workshop on R&D and Innovation surveys for NSTIH staff, (CeSTII), Cape Town	NSTH/ASTII	Cape Town, SA Africa: 24-29 March	6 staff of the NSTIH trained on how to conduct STI surveys and to use STI data for tracking progress and impact assessment of STI Programmes.
7	2nd In-house Training on STI Indicators for NSTIH staff	NSTIH/ASTII	Rustenburg, SA: 28-30 May 2013	10 staff of NSTIH trained by UIS

	Event(s)	Who	Venue & Dates	Outcomes
8	OECD/NESTI Meeting (STI) (une 2013)	RA	Paris, France: 17-19 June 2013	Made inputs on the review of the Frascati Manual
9	Working visit at UIS,	PC	Montreal, Canada 21-26/4/2013	MoU with UIS and alignment of the ASTII Survey instruments with UNESCO
10	The Innovative Africa Forum	PC	Kampala, Uganda, 27-28/11/2013	Contributed as keynote speaker on the debate on how to create a conducive environment and ecosystems for innovation in Africa.
11	African Innovation Summit (AIS)	NSTIH/ ASTII	Prai, Cape Verde 1-6/02/2013	Enhanced ASTII awareness among stakeholders and resource mobilization efforts
12	International Scientific Advisory Board (ISAB) of the Southern African Centre for Infectious Disease Surveillance (SACIDS)	PC	Dar-es-salaam, Tanzania 25-26/03/2014	Review of R&D projects and overall SACIDS programme
13	SADC STI Experts meeting	NSTIH/ ASTII	Pretoria, 15- 18/4/2014	Review and provide expert advice on various STI documents for SAMCOST and AMCOST meetings ASTII/SADC collaborations discussed.

Notes: PC= ASTII Programme Coordinator; RA = ASTII Research Assistant; PA = Personal Assistant

4. ASTII PHASE-2 FINANCIAL REPORTS & AUDITS

4.1 Financial Reports

For the reporting period the following Financial Reports have been prepared and presented by the NPCA Finance Unit and approved by Sida:

- i. Income and expenditure statement for the period 1 July 2010-30 September 2012 (Annex 8);
- ii. Income and expenditure statements for the period 1 July 2010-31 December 2012 (Annex 9);
- iii. Income and expenditure statement for the period 1 July 2010-31 December 2013 (Annex 10).
- iv. The most recent financial statements (yet to be approved by Sweden) for the reporting period covers the non-cost extension period of ASTII (1 Jan 2013-30 April 2014) (Annex 11).

4.2 Audit Reports

Internally, audits are performed by the Office of the Director of Internal Audit from AUC in Addis-Ababa in order to ensure compliance with AU financial rules and regulations. External audits are commissioned by NPCA as part of the requirements of the Grant Agreement signed between Sweden and NPCA. The following external audits have been commissioned by NPCA during ASTII-2:

- i. 1st Audit report for the period 1 July 2010-31 December 2011 (Annex 12);
- ii. Audit Report for the period 1 July 2010-31 December, 2012 (Annex 13).

The two audits have established that ASTII-2 Project Statements of Income and Expenditure were compliant with the Sida grant agreement and the audits on both instances were unqualified.

The 3rd ASTII Review Meeting held in Nairobi on 19-20 February 2014 decided that NPCA shall commission the final external audit after the closure of ASTII-2 on 30th April, 2014. The final audit report shall be submitted to Sweden by 30th June 2014 and will cover the period 1 January 2013-30 April 2014.

5. OBSERVED ASTII IMPACT

One of the major achievements of the ASTII Initiative has been the building of capacities of Member States to collect and analyse data on STI. With the exception of South Africa and Tunisia, AU Member States did not have units established within their statistics systems that were dedicated to collecting data on STI. The capacity building yielded a lot of benefits, among them, moving countries from a no STI data collection system status to one where countries are able to collect their own national statistics.

Prior to the launch of the ASTII Initiative, most of the AU Member States did not have STI data that was recognised as part of national statistics. One of the main goals of the programme was to develop capacity in the Member States for collecting STI data as part of national statistics. This report shows that STI data has now been institutionalised as part of national statistics. This is important because AU Member States now have national STI statistics which they can use to inform policy formulation. As the case studies from the various countries covered in Box 1 indicate, Member States have made decisions based on the key messages from the national survey data.

The ASTII Initiative has been unique in readily stimulating buy-in by Member States and requests for countries to join the Initiative keep coming from the countries that have not yet launched their national surveys. Integration of STI data into national statistics has provided a high degree of independence among the Member States traditionally dependent on sources outside the continent to report on the status of STI in their countries. This was not a reliable source given that more often than not, statistics on most African countries were missing due to non-availability of data. It was therefore common to get data tables where the majority of the African countries had blanks for most of the indicators.

The socio-economic impacts of ASTII and its impacts on the science community are likely to be felt in the medium to long term. Suffice to say that the ASTII Initiative has institutionalized a culture of collection and use of STI statistics on the continent. It is expected that STI data will have similar impacts on other sectoral policies particularly education, commerce and industry (Trade and Investment), Small-Medium Enterprises (SMEs) and overall economic strategies on the continent in the subsequent phases.

To achieve better impact and the use of STI indicators in development, experts must embark on strategic popularization, sensitization and advocacy among stakeholders, policy makers and the executives in government and the private sector. These actions need to be enhanced in future phases of ASTII.

Box 1. Success Stories

Kenya: Over the implementation period of ASTII, Kenya has increased her national target for R&D expenditure as a percentage of GDP to 2% according to the newly adopted National STI Policy. This is a substantial increase given that in 2010 Kenya's actual R&D expenditure as a percentage of GDP was 0.48% (NEPAD, 2010). Margaret Kamar, Kenya's Minister for Higher Education, Science and Technology noted that "It is a big victory for STI when the government approves not just what we had asked for – one per cent – but raised it to two per cent [of GDP]," (www.scidev.net/global/policy/news/kenya-poised-for-major-science-commitment.html).

Nigeria: The Government of Nigeria extensively used the results in the African Innovation Outlook 2010 report to review the country's STI Policy in 2012. Nigeria noted among other things that its R&D intensity (GERD/GDP) of 0.2% was too low to drive sustainable development and a far cry from African target of 1.0%. Based on this information the new STI Policy of Nigeria is trying to improve its budgetary allocation to STI, establishing a special fund for R&D called the National Research and Innovation Fund (NRIF) and a Venture Capital has also been launched. Nigeria has also taken steps to increase its human capital in STI by addressing the admission ratios in favour of Science, Engineering and Technology (SET) and by establishing nine new universities for S&T (Personal communication, ASTI national focal point)

South Africa: The Ten-year Innovation Plan on transforming South Africa into a knowledge economy is a product of monitoring R&D and innovation indicators. The definition of knowledge economy according to this plan is "economy whereby the production and dissemination of knowledge leads to economic benefits and enriches all fields of human endeavor" (DST, 2007)⁵. STI indicator data have spurred several initiatives in South Africa based on emerging information from the analysis. Another initiative of government informed by S&T data has been the tax incentive policy under which certain R&D expenditure receives tax exemption. Also known as the scientific or technological research and development programme, the tax-incentive scheme is an indirect approach by government to increase national scientific and technological research and development expenditure and complements government expenditure on scientific or technological research and development activities (SARS, 2009, cited in Rumbelow, et al., 2010)⁶.

The Intellectual Property Rights from Publicly Financed Research & Development Act of 2008 also benefitted from S&T indicators data. Implementation Regulations of the Act, which were legislated in 2010, require that all intellectual property (IP) for commercial or societal benefit from South African public institutions should be registered, protected and used or made available to others (Rumbelow, et al., 2010).

Tanzania: In addition to the standard ASTII questionnaires, Tanzania extended the survey to assess the state of laboratories and scientific equipment in the country. Based on evidence from this survey, the government has since allocated a budget for the rehabilitation of laboratories and equipment, a move that has resulted in improvement in R&D infrastructure in public institutions in the country (Personal communication, ASTII national focal point).

5 Department of Science and Technology, South Africa (DST) (2007). Innovation towards A knowledge-based economy Ten-year plan for South Africa (2008 – 2018). Pretoria: DST. 14 August

6 Rumbelow, J., Sithole, M., Molotja, N., Leiberum, V., Parker, S., Sikaka, W., Magidimisha, H. and Labadarios, D. 2010. Gauteng Region OECD Territorial Review Report. Section 1.6. Innovative Capacity and R&D and Section 2.2: Policies for Economic Development and Innovation. Centre for Science, Technology and Innovation Indicators (CeSTII). Human Sciences Research Council (HSRC).

6. CHALLENGES AND LESSONS

The main challenges encountered in the implementation of ASTII-2 include the following:

Countries are participating in the ASTII programme but it is yet to be fully institutionalized

Several countries have now joined the ASTII programme and are carrying out surveys but not all of them have fully institutionalized it in their national planning processes. This will require continuous advocacy by the NEPAD Agency and its partners which will have to be increased during the next phase. The various concrete achievements that have been realized provide good basis for engaging Member States and the Regional Economic Communities.

Most RECs have not clearly defined STI priorities and their (STI) contribution to the achievement of other sectors

Over the past six years that the ASTII programme has been implemented, most of the RECs have not had effective STI departments or units as a result there have not been strong processes for coordinating STI matters hence data collection and analysis systems that could be linked to the ASTII programme. The situation is however getting better with time. For instance, the ASTII programme trained members of the COMESA Innovation Council who have expressed interest in starting a process of collecting STI indicators. Likewise, the STI Department at ECOWAS and SADC have been strengthened in the year 2014, resulting in increased interest from the two RECs in developing a process for collecting STI indicators for West Africa and Southern Africa respectively.

Variations in the quality of data from Member States

Despite the observed marked increase in the number of countries on ASTII, the quality of data collected, consistency in conducting surveys and institutionalization of STI statistics at national level are issues that still need to be addressed during the proposed third phase of ASTII.

STI activities have not been prioritized in the national budgets

Low level of domestic investment for science and technology in general has remained a challenge which has also affected funding for the ASTII activities at national level. The situation is however improving as a number of countries are establishing innovation funds. Through the various messages that are emerging from ASTII surveys, countries are reconsidering their level of investment into STI. It is pleasing to note that some of the pro-research policy pronouncements are being made pointing to the intent to increase domestic investment in research and development.

Robust system for data repository has not yet been established

Since ASTII data collection started, it has not been possible to develop a common database. About 70% of the data collected by countries have not found decent homes, the data are still on the laptops of the national enumerators. This is due to absence of a common platform which should have served as a repository of statistics collected at the regional and national levels.

Sustaining a critical mass of experts in STI indicators at national level

The ASTII Initiative has trained several national personnel on carrying out research and development and innovation surveys but it has not been possible to reach a critical mass due to mobility of staff through promotion, retirement and migration. This has therefore necessitated additional training activities in the countries.

Staffing at the ASTII Secretariat

Just as in Phase-1, in Phase-2, NEPAD had relatively limited in-house human capacity for implementing ASTII. The ASTII Coordinator and the other two staff worked remarkably well often under challenging and changing circumstances to provide technical and administrative leadership to implement ASTII. However, they could not meet the demand for technical support to the countries especially given the increased number of countries on the initiative.

Procurement procedures

Procurement procedures within NPCA are too demanding and they slow down the activities and most of the time deadlines are missed.

7. RECOMMENDATIONS

- i. If NEPAD is to effectively and efficiently implement ASTII in future, it requires additional staff. It is recommended that the organization should recruit at least two additional full-time technical staff for R&D and innovation surveys. If the current available funding is inadequate to enable NEPAD to recruit two full time staff, it should consider hiring part-time staff to support countries to effectively and efficiently conduct R&D and innovation surveys.
- ii. There is need to diversify sources of funding to assure the long term sustainability of the programme.
- iii. A mechanism for supporting S&T desks in RECs should be found to promote collaboration with the NSTIH and ASTII in particular. This could include financial and technical support to be extended to S&T desks in RECs.
- iv. To improve on the delivery of the programme, it is recommended that the programme should submit quarterly requests in advance so that travel approvals and procurement processes can be followed and accomplished on time. The fast-track procurement process, annual procurement plans and work plans to be submitted at the beginning of the year to be evaluated and approved.
- v. Finally, the conditions of the grant agreements between NEPAD and countries on one hand and between the donor and NEPAD on the other should be streamlined to avoid grant agreements from being impractical to implement. There is a need for the grant agreement (audit requirements - Article 8) between the donor and NEPAD to be more flexible, to allow countries to submit internal audit reports, as the cost of external audit reports is very high and considering that only \$25,000.00 is provided to countries.

This recommendation was discussed and addressed by the 3rd ASTII Review Meeting held in Nairobi on 19-20 February, 2014 under Item 9 of the Minutes " External audits expected from AU Member States as follows:

- 9.1 Audit of third party grantees shall be required only for amounts above SEK284,000 (US\$40,000) in line with Sida audit requirements.
- 9.2 A template from Sweden on third party agreements will be shared with NEPAD in order to guide revision of future sub agreements. This has since been provided.

8. CONCLUSIONS

The second phase of ASTII has successfully build on the foundation developed in Phase 1 and has made significant progress and stimulated AU Member States to start developing STI indicators. It has enabled some countries to start conducting R&D and Innovation surveys and to build national capacities for STI indicators. ASTII has in some instances managed to influence STI policy-making on the continent. This has led to the expansion of ASTII activities on the continent. NEPAD has been instrumental and successful in coordinating and ensuring the success of phase-2 of ASTII.

Some of the main areas that need attention in order to improve the work and outreach of the ASTII initiative include (1) the development of a regional platform for data storage, retrieval and analysis, (2) enhanced capacity development of data collection, data quality, analysis and use at the national and regional levels, (3) expansion of the ASTII research activities to develop STI measurements that best inform and meet Africa's unique development needs, and (4) linkage of STI related indicators to Africa's peer review mechanism (APRM).

There is a need to build a continental platform that is anchored on the concept of an information system for STI statistics as envisioned by AMCOST V. Such a platform will serve as a repository for STI data storage and allow for easy access and use of data on the continent. The success of the platform will depend on the capacity of AU Member States to collect and supply reliable data. This is a niche area for ASTII and AOSTI.

ASTII will have to strengthen the capacity of Member States through in-country training and training of trainers courses in order to generate a critical mass of STI experts in Africa that can supply reliable data. This is also important to mitigate against staff mobility through promotion, retirement and migration as well as to improve the quality and sustain the production of quality data. In addition, it is desirable that by 2017 at least two thirds of AU Member States participate in ASTII.

While the capacity to collect data is emerging, there is a need to develop tools that can help countries assess the performance of STI and inform policy makers, sectors and firms. Countries can use such tools to measure the performance and efficiency of their national system of innovation (NSI). Research in this area would use data from ASTII surveys and other publicly available databases. It is appropriate to expand the current scope of indicators collected to meet Africa's economic and social development aspirations.

In order to sustain the ASTII programme and increase its significance for the development and implementation of STI policy for development, additional work is required, including the use of STI indicators for policy formulation and implementation, strengthening statistical capabilities to improve the quality of data and a greater investment in human capital development.

Overtime, the African Innovation Outlook series is expected to contribute to better understanding of the interventions required of African governments, international partners and the STI community in the further development and application of science, technology and innovation in Africa.

Annex 1: ASTII-II Logical Framework

Types of Outputs	Outcomes	Performance Indicator of outcome	Data sources	Data Collection Strategy			Assumptions	Baseline 2011	Target 2012	Results 2013/14
				Method	Who	When				
Goal: To contribute towards better quality of STI policies at national, regional and continental levels										
Main Objective: To support and strengthen Africa's capacity to develop and use STI indicators in development and planning policy										
SO#1: Establish African-based system for collecting and analyzing STI indicator data										
Internationally comparable STI indicators adopted by at least 30 African countries by 2013	R&D and innovation survey instruments developed and adopted by at least 30 countries by 2013	Increase in number of countries adopting R&D and innovation survey instruments	National progress reports by Focal Point (Ministry in Charge of STI & National Statistics Offices, NSOs) ASTII Progress Reports	Existing reports	ASTII	Annual	Country preparedness to adopt and implement the ASTII initiative	19	28	35
At least 30 ASTII national focal points trained in collection of R&D and Innovation data	Enhanced skills in data collection and analysis at national and regional level	Number of ASTII training Workshops conducted Increase in the number of focal points/experts trained	ASTII Progress Reports ASTII Progress reports	Expression of interest to join the ASTII Initiative or to participate in ASTII surveys Review of Progress Reports Review of progress reports	ASTII	Annual	ASTII national coordinators nominated Interest from countries to be trained Political & institutional support	2	3	7
								50	150	>300

Types of Outputs	Outcomes	Performance Indicator of outcome	Data sources	Data Collection Strategy			Assumptions	Baseline 2011	Target 2012	Results 2013/14
				Method	Who	When				
Full R&D and Innovation surveys conducted in at least 10 AU Member States by 2013	Quality statistics and reports produced at national level	Increase in the number of countries collecting and submitting STI data to NEPAD-ASTII	ASTII Progress Reports	Review of progress reports			13	17	21	
				Web-platform tracking and Programme evaluations			4	4	7	
							0	0	2	
ASTII Programme established in at least two RECS by 2013	Quality ASTII indicators and datasets produced by REC	Focal points in RECs Number of training workshop with RECs	Progress reports	Review of progress reports Programme evaluations	ASTII	Annual	Strong Ministry responsible for STI Countries assess and compare their regional and national performances	1	2	3

Types of Outputs	Outcomes	Performance Indicator of outcome	Data sources	Data Collection Strategy			Assumptions	Baseline 2011	Target 2012	Results 2013/14
				Method	Who	When				
SO#2: Establish a platform for publishing STI indicators data for AU Member States by 2013										
ASTII Web-based data platform established by 2013	Availability of better quality STI statistics and easily mined data on Africa	Number of visits to web-based platform	Web database use reports	ASTII	Quarterly	ICT infrastructure readiness in AU Member States	0	0	TBC	
	Increased demand for data	Number of requests received for specific data	Web database use reports	ASTII	Quarterly		0	0	TBC	
SO#3: Enable AU Member States to utilize reliable and accurate information on STI indicators for policy formulation and tracking commitments R&D and Innovation										
African Innovation Outlook Reports published every two years	Evidence-based STI policy formulation adopted and followed at national and regional levels	Number of countries making reference to STI data in planning of programmes and policy	ASTII Progress reports National reports from the Ministry in Charge of STI National Economic Plans & Policy documents	Programme evaluations (mid-term and end of programme) Content analysis	NPCA	Annual	NSOs involved in data collection processes	4	4	7
								1	0	2
Other publications (Policy briefs, Case Studies and Newsletters) produced and disseminated		Number of AIO Reports published					0	0	4	
		Number of Case studies on NSI published					0	0	3	
		Number of Policy Briefs published					0	1	2	
		Number of Newsletters Produced					0	1	2	

Types of Outputs	Outcomes	Performance Indicator of outcome	Data sources	Data Collection Strategy			Assumptions	Baseline 2011	Target 2012	Results 2013/14
				Method	Who	When				
SO#4: Monitor and Evaluate the ASTII Programme										
A set of indicators for measuring and tracking ASTII progress identified	ASTII Monitoring and Evaluation system developed and in use	Annual Reviews on ASTII outputs and outcomes	Reports and publications	Reviewing reports, publications, press releases, feedback from national focal points of existing reports	NPCA/ Sweden	Annual	Availability of experts to conduct M&E	1	0	3
		Documented lessons learnt	Feedback from ASTII Focal points							

Annex 2: ASTII National Focal Points

Country	Ministries	National Statistics Office And Others
1. Algeria	Prof Mokhtar Sellami: Directeur Développement Technologique et Innovation Direction Général de la Recherche Scientifique et Développement Technologique, Ministère de l'Enseignement Supérieur et Recherche Scientifique	
2. Angola*	Dr Domingos da Silva Neto: National Director, Scientific Research Ministry of Science and Technology	Mr Nlando Mpaka: Technician of Department of Demographic and Social Statistics
	Ms Emingarda Patricia Castelbranco: Head of Scientific Research Promotion, Department Ministry of Science and Technology	
3. Benin	Dr Hounzangbe-Adote Sylvie: Directeur National: Recherche Scientifique & Technologique, Direction Nationale de la Recherche Scientifique et Technique, Ministère de l'Enseignement Supérieur et Recherche Scientifique	
	Dr Joslyn Kouton: Chef du Service de Coordination et de Suivi-Evaluation des Activités de Recherche, Direction Nationale de la Recherche Scientifique et Technique, Ministère de l'Enseignement Supérieur et Recherche Scientifique	
4. Botswana	Ms Lesego Motoma: Director, Department of Research, S&T, Ministry of Infrastructure, Science and Technology	Ms Ketso Makhumalo: Statistics Botswana
	Dr Abraham Mathodi: Principal Research Officer (M & E) Department of Research, Science and Technology	
5. Burkina Faso*	Prof Compaoré R.A. Maxime: Secrétaire Général, Ministère de la Recherche Scientifique et de l'Innovation	Dr Placide Some Sankar: Ingénieur Statisticien Economiste, Institut National de la Statistique et de la Démographie
6. Burundi	Dr Tatien Masharabu: Director-General: Science, Technology & Research, Ministry of Higher Education and Scientific Research	
7. Cameroon	Dr Roger Noël Iroume: Inspecteur Général #2, Ministère de la Recherche Scientifique et de l'Innovation	Dr Séverin Tchomthe: Ingénieur Statisticien Economiste, Institut National de la Statistique
8. Cape Verde*	Dr Emanuel Borges: Head: Data Collection and Processing, Ministry of Higher Education, Science and Innovation	Mrs. Alicia Maria da Cruz Mota: Statistician, National Institute of Statistics

Country	Ministries	National Statistics Office And Others
9. Chad	Dr Moussa Isseini: Directeur de la Recherche Scientifique et Technique, Ministère de l'Enseignement Supérieur et de la Recherche Scientifique	Dr Fata Rouane: Ingénieur Statisticien Economiste, Institut National de la Statistique, des Etudes Economiques et Démographiques Chef de Service des Etudes et Statistiques Sociales
10.	Prof Clobite Biona Bouk: Conseiller du Ministre, Ministère de la Recherche Scientifique et Innovation Technologique	
11. Congo, Dem. Rep.	Dr Maurice Iyanza Mbako: Directeur & Coordonnateur: Etudes et Planification, Secrétariat Général de la Recherche Scientifique, Ministère de l'Enseignement Supérieur	Mr Mingiedi Matondo Boaz: Comptable National, Institut National de la Statistique
12. Egypt*	Prof Dr Maged Al-Sherbiny: President of Academy of Scientific Research and Technology, Academy of Scientific Research and Technology	
	Dr Nora Adel Zaki: Technical manager, Academy of Scientific Research and Technology	
13. Ethiopia*	Dr Getachew Atintie: Director, Plan Preparation and Implementation Directorate, Ministry of Science and Technology	
	Ms Zebiba Abdo Ibrahim: Senior expert: Plan Preparation and Implementation Directorate, Ministry of Science and Technology	
14. Equatorial Guinea	Dr Ondo Mba Teodoro : Directeur Général, Ministère de l'Education & Recherche Scientifique	
15. Gabon*	Dr Anasthasie Obono Mba, épouse Essono: Directeur de la Planification, Ministère de l'Education Nationale, de l'Enseignement Supérieur, de l'Enseignement Technique et de la Formation Professionnelle	Mr Jean Nestor Nguema Mebane: Ingénieur Statisticien-Economiste en Chef, Direction Générale de la Statistique, Ministère de l'Économie et des Finances
16. Ghana*	Dr Emmanuel K. Tetteh: Research Scientist, Science and Technology Policy Research Institute	Mr Johnson Kagya Owusu: Senior Statistician, Ghana Statistical Service
17. Kenya*	Dr Richard Mavisi Liahona: Assistant-Director, Directorate of Research Management and Development, Ministry of Higher Education, Science and Technology	Ms Rosemary Uside-Kongani: Statistician, Kenya National Bureau of Statistics
18. Lesotho*	Dr Lefa Thamae: Director, Science & Technology, Ministry of Communications, Science & Technology	Ms Malehloa Molato: Statistician, Bureau of Statistics
	Dr Tsepo Ntho: Senior Research Officer, Department of Science and Technology, Ministry of Communications, Science & Technology	

Country	Ministries	National Statistics Office And Others
19. Liberia	Mrs Sangay Faeflen: Director, Science and Technology, Ministry of Education	Mr Francis F. Wreh: Deputy Director General for Statistics and Data Processing, Liberia Institute of Statistics and Geo-Information Services
	Mr Prince Drubo Quayeson: Science Coordinator, Division of Science and Technology, Ministry of Education	
20. Malawi*	Dr Patrick Mphadzula: Acting Director, Department of Science and Technology, Ministry of Education, Science and Technology	Ms. Angela Msosa: Chief Statistician, National Statistics Office
21. Mali*	Prof Mohamed Dicko: Chef de Division, Recherche Scientifique, Centre National de la Recherche Scientifique et Technologique	Mr Modibo Traore: Chef de division statistiques environnementales, Département des statistiques agricoles et environnementales
22. Mauritius	Dr Ricaud Auckbur Gervais Danyel: Director: Ministry of Tertiary Education, Science, Research and Technology	Mr Dharsing Pothegadoo: Statistician, Statistics Mauritius
23. Mozambique*	Dr Mety Oreste Gondola: Deputy National Director , Directorate of Planning, Statistics and Cooperation, Ministry of Science and Technology	Dr Xadreqe Maunze: Chief of Department of Demographic Studies, National Institute of Statistics
	Mr Maximiano Dgedge: Head of Statistics Department, Ministry of Science and Technology	
24. Namibia*	Dr Alfred Adriaan van Kent: Director, National Research, Science, Technology & Innovation, Ministry of Education	Ms Linda-Vute Shitenga: Statistician, Central Bureau of Statistics
	Mr Collins Mushe: Senior Programme Officer, National Commission on Research, Science and Technology, Department : Research, Science and Technology Coordination and Support	
	Dr Eino Mvula: Chief Executive Officer, National Commission on Research Science and Technology	
25. Niger	Dr Hassirou Mouhamadou: Directeur de la Recherche Scientifique, Ministère des Enseignements Moyen et Supérieur et de la Recherche Scientifique	
	Mr Amadou Illya: Chef de la Division de la Recherche Scientifique, Ministère des Enseignements Moyen et Supérieur et de la Recherche Scientifique	
26. Nigeria*	Dr Willie O. Siyanbola: Director-General/Chief Executive Officer, National Centre for Technology Management	
	Mr David Adeyeye: Senior Planning Officer, Planning and Coordination Department, National Centre for Technology Management	
27. Rwanda	Dr Twiringiyimana Remy: Acting Director General, Science Technology and Research, Ministry of Education	Dr Gasingirwa M.Christine: Kigali Institute of Science and Technology

Country	Ministries	National Statistics Office And Others
28. Senegal*	Dr Nouhou Diaby: Conseiller Technique du Ministre, Ministère de l'Enseignement Supérieur et de la Recherche	Mr Samba Ndiaye: Statisticien: Direction des Statistiques Démographiques et Sociales, Agence Nationale de la Statistique et de la Démographie
	Dr Toumane Doumbouya: Coordinateur des Centres de Recherche et d'Essais (CRE), Direction de la Recherche Technologique, Ministère de l'Enseignement Supérieur et de la Recherche	
29. South Africa*	Dr Godfrey Mashamba: Chief Director/General Manager, S&T Investment, Department of Science and Technology	
	Ms Rose Msiza: Deputy Director : Science and Technology Indicators, Department of Science and Technology	
30. Tanzania*	Mrs Blandina Mkayula: Senior Education Officer, Ministry of Science, Technology and Higher Education	Dr Dugushilu Mafunda: Principal Research Officer, Tanzania Commission for Science and Technology
		Mr Festo Maro: Senior Researacher, Tanzania Commission for Science and Technology
31. Togo*	Prof Messanvi Gbeassor: Director: Scientific and Technical Research, Ministry de l'Enseignement Supérieur	Mr Bika Koudjo Dzidéfo: Ingénieur des Travaux Statistiques, Direction générale de la statistique et de la comptabilité nationale
	Dr Amegnona Agbonon : Maître de Conférences Facultés des Sciences (Associate Professor), Université de Lomé	
32. Tunisia	Dr Rachid Ghrir: Directeur Général, Ministère de l'Enseignement Supérieur, Recherche Scientifique et Technologique	Dr Arbia Ben Othman : Observatoire National des Sciences et de la Technologie, Ministère de l'Enseignement Supérieur, Recherche Scientifique et Technologique
33. Uganda*	Mr Suudi Kizito: Senior Engineer, Ministry of Trade, Industry and Cooperatives	Ms Imelda Atai Musana: Principal Statistician and Head, Business and Industry Statistics, Uganda Bureau of Statistics
		Dr Richard Lutalo: Senior Science Officer, Uganda National Council for Science and Technology

Country	Ministries	National Statistics Office And Others
34. Zambia*	Ms Dorothy Kasote (Deceased): Principal Systems Analyst, Ministry of Education, Science, and Vocational Training	Ms Nchimunya Nkombo: Principal Statistician, Central Statistics Office
		Mr Filipo Zulu: Programme Officer – Policy, Regulation Monitoring and Evaluation, National Science and Technology Council
	Dr Lackson Tonga : Chief Science and Technology Officer, Ministry of Education, Science, and Vocational Training	Dr H. Kaunda: Senior Statistician, Ministry of Commerce, Trade and Industry
35. Zimbabwe*	Dr Willie Ganda: Director, Research Development and Innovation, Ministry of Higher and Tertiary Education, Science and Technology Development	

The ASTII Focal Points shown with asterisks (*) undertook the surveys at national level and submitted data to ASTII.

Annex 3a: Overall ASTII-2 Programme Budget July 2010-December 2013

		Budget 2010	Budget 2011	Budget 2012	Budget 2013	Total USD	Total ZAR	Total SEK	% of the Total
	Activities	USD							
1	Personnel Costs	107,232	214,464	214,464	89,360	625,520	4,593,193	4,808,560	20%
1.1	Co-ordinator (P4)	52,710	105,420	105,420	43,925	307,475	2,257,789	2,363,653	
1.2	Research Assistant (P1)	35,664	71,328	71,328	15,715	194,035	1,424,799	1,491,605	
1.3	Secretary	18,858	37,716	37,716	29,720	124,010	910,605	953,302	
2	Support national surveys		532,000	213,000		745,000	5,702,975	5,727,039	24%
2.1	R&D surveys		335,000	213,000		548,000	4,023,964	4,212,640	
2.2	Innovation surveys		197,000			197,000	1,446,571	1,514,398	
3	Capacity building on STI indicators	330,000	200,000	240,000	221,627	991,627	7,590,908	7,622,938	32%
3.1	Training on R&D and Innovation	260,000	200,000	240,000	221,627	921,627	6,767,510	7,084,827	
3.2	Support to STI related Research calls	70,000				70,000			
4	Dissemination of ASTII information	50,000	150,000	200,000		400,000	2,937,200	3,074,920	13%
4.1	Building ASTII web-platform		70,000	70,000		140,000	1,028,020	1,076,222	
4.2	Production of AIO	50,000		50,000		100,000	734,300	768,730	
4.3	Translation and interpretation		50,000	50,000		100,000	734,300	768,730	
4.4	Production of ASTII manuals		30,000	30,000		60,000	440,580	461,238	
5	Evidence on best practices	10,000	25,000	10,000	30,000	75,000	550,725	576,548	2%
5.1	Monitoring and evaluation of the project	10,000	10,000	10,000	10,000	40,000	293,720	307,492	
5.2	External evaluation of the programme		15,000		20,000	35,000	257,005	269,056	
6	RPI Services and Experts Group	47,481	94,962	94,962	47,481	284,885	2,091,914	2,190,000	9%
6.1	RPI services and expert group	47,481	94,962	94,962	47,481	284,885	2,091,914	2,190,000	
Total Budget 2010-2013 (USD)		544,713	1,216,426	972,426	388,468	3,122,033	22,925,088	24,000,000	100%
Total Budget 2010-2013 (ZAR)		3,999,827	8,932,215	7,140,523	2,852,523				
Total Budget 2010-2013 (SEK)		4,187,372	9,351,030	7,475,329	2,986,273				

Budget Notes:

The total budget amount to SEK 24,000,000 spread over the period July 2010- December 2013 (i.e. SEK 4,187,372 for July 2010-December 2010, SEK 9,351,030 for January-December 2011, SEK 7,475,329 for January-December 2012, and SEK 2,986,273 for January – December 2013).

The following exchange rates have been applied 1US\$=7.343 ZAR; 1US\$=7.687 SEK; and 1ZAR= 0.994 SEK.

Annex 3b: Africa Science, Technology and Innovation indicators (ASTII) Initiative Work Plan: January to December 2013

	Milestones	J	F	M	A	M	J	J	A	S	O	N	D	US\$	ZAR	SEK
1	Personnel costs															
1.1	Coordinator of ASTII: Prof Luke Mumba	X	X	X	X	X	X	X	X	X	X	X	X	123 432	1 049 172	789 965
1.2	Research Assistant on the ASTII: Mr. Lukovi Seke	X	X	X	X	X	X	X	X	X	X	X	X	71 328	606 288	456 499
1.3	Secretary to the ASTII programme team: Mrs. Manana Mashologu	X	X	X	X	X	X	X	X	X	X	X	X	37 716	320 586	241 382
	Sub-total													232 476	1 976 046	1 487 846
2	Support national surveys															
2.1	R&D surveys	X	X	X	X	X	X	X	X	X	X	X	X	150 000	1 275 000	960 000
2.2	Innovation surveys	X	X	X	X	X	X	X	X	X	X	X	X	150 000	1 275 000	960 000
	Sub-total													300 000	2 550 000	1 920 000
3	Capacity building on STI indicators															
3.1	Training Countries on R&D and Innovation															
3.1.1	Training Countries on data collection and validation		X									X		150 000	1 275 000	960 000
3.1.2	Production of policy briefs on STI indicators							X	X	X				40 000	340 000	256 000
3.1.3	Mapping of ongoing regional initiatives on STI to establish synergy with ASTII (Note 1)				X									50 000	425 000	320 000
3.1.4	Engage with RECs on their ongoing efforts to develop regional frameworks for STI indicators and observatories (Note 2)					X	X	X	X	X				35 000	297 500	224 000
3.2	Support to STI related research calls	X	X	X	X	X	X	X	X	X				80 000	680 000	512 000
	Sub-total													355 000	3 017 500	2 272 000

Milestones	J	F	M	A	M	J	J	A	S	O	N	D	US\$	ZAR	SEK
4	Dissemination of ASTII information														
4.1															
4.1.1			X	X	X	X	X	X	X	X	X	X	20 000	170 000	128 000
4.1.2			X	X	X	X	X	X	X	X	X	X	30 000	255 000	192 000
4.1.3			X		X				X				45 000	382 500	288 000
4.1.4			X	X	X	X	X	X	X	X	X	X	25 000	212 500	160 000
4.2	Production of AIO														
4.2.1		X	X	X	X	X	X	X					50 000	425 000	320 000
4.2.2						X	X						10 000	85 000	64 000
4.2.3						X	X						30 000	255 000	192 000
4.3		X	X	X	X	X	X	X	X	X	X	X	30 000	255 000	192 000
4.4	Production of STII manuals														
4.4.1						X	X	X	X	X			30 000	255 000	192 000
4.4.2				X	X	X	X	X	X	X	X	X	15 000	127 500	96 000
													285 000	2 422 500	1 824 000
5	Evidence on best practices														
5.1		X	X	X	X	X	X	X	X	X	X	X	30 000	255 000	192 000
5.2													0	0	0
													30 000	255 000	192 000

Milestones	J	F	M	A	M	J	J	A	S	O	N	D	US\$	ZAR	SEK
6															
RPI services and expert group															
6.1	X	X	X	X	X	X	X	X	X	X	X	X			
RPI services and expert group															
7															
Preparation of new proposal for funding															
7.1	X	X	X	X											
Preparation of new proposal with AOSTI															
Sub-total													1 202 476	10 221 046	7 695 846
Total													1 202 476	10 221 046	7 695 846

Budget Notes

- Note 1:** ASTII will engage other regional initiatives to establish synergies and will convene one Stakeholders' Workshop to validate the final outcomes
- Note 2:** ASTII will hold consultations with RECS to identify their training needs on regional STI surveys and provide technical support in setting up of regional STI Observatories
- Note 3:** ASTII will on a part-time basis engage a Statistician and an intern to assist in STI data processing and analysis within NSTIH
- Note 4:** Staff of ASTII and NSTIH will be trained at the UNESCO Institute of Statistics (UIS) in Canada and at the Centre for Science, Technology and Innovation (CeSTI) in, Cape town, South Africa
- Note 5:** Draft R&D Survey Manual which has been produced by UNESCO will be reviewed by a team of experts with the view to adapting and adopting it to the needs of Africa

Outputs for the ASTII 2013 workplan

At least 3 policy briefs produced and distributed widely

- Four research reports published from research grants
- AIO published by August 2013 with key policy recommendations to Member States, RECs, AUC and NEPAD.
- R&D survey manual adopted by the AOSTI intergovernmental committee by August 2013
- Draft innovation survey manual developed for circulation to Member States through AOSTI by August 2013
- Partnerships developed with African and international institutions
- Robust database developed by NSTIH for archiving raw data from members national and regional surveys
- Alignment and harmonization of programmes between ASTII and AOSTI strengthened

Outcomes for the ASTII 2013 workplan

NSTIH staff equipped with skills and competence for cleaning STII data

- Resource mobilization base diversified by working in collaboration with AOSTI and RECs
- National and regional focal points acquire skills and competence for collecting and processing STII data
- Framework for regional STI observatories developed and utilised by at least 2 RECs by Dec 2013

Annex 3c: ASTII Work for Non-Cost Extension Jan-April 2014

	Milestones	Month						Budget		
		J	F	M	A	M	J	US\$	USD	
1	Personnel costs							J-F-M-A	Balance M-A	
1.1	Coordinator of ASTII: Prof Luke Mumba			X	X			44 204	22 102	
1.2	Research Assistant on the ASTII: Mr Lukovi Seke			X	X			25 860	12 930	
1.3	Secretary to the ASTII programme team: Mrs Manana Mashologu			X	X			13 594	6 797	
	Sub-total							83 658	41 829	
2	Support national surveys									Note 1
2.1	R&D surveys			X				5 000	5 000	
	Sub-total							5 000	5 000	
3	Capacity building on STI indicators									
3.1	Support to ASTII research call deliverables			X	X			34 000	34 000	Note 2
	Sub-total							34 000	34 000	
4	Dissemination of ASTII information									
4.1	Maintenance ASTII data web-platform synchronized with AOSTI web-platform									
4.1.1	Procure hardware and software for ASTII database			X	X			10 000	10 000	Note 3
4.1.2	IT support for database maintenance and STI outreach			X	X			10 000	10 000	Note 4
4.2	Production of AIO & 3rd Policy brief									
4.2.1	Type setting and printing of AIO & 3rd Policy brief (+)			X	X			29 000	10 000	Note 5
4.2.2	Africa Innovation Summit (++) & Launch of AIO-2013 report (English version)			X	X			43 000	28 000	Note 6
4.2.3	Translation of AIO & 3rd Policy brief			X				10 000	10 000	Note 7
4.3	ASTII R&D/Innovation instrument review									
4.3.1	Review and update of R&D and Innovation survey instruments			X				0	0	Note 8
4.4	Collaboration and other ASTII related events (*)			X	X			10 000	0	
	Sub-total							112 000	68 000	

	Milestones	Month						Budget		
		J	F	M	A	M	J	US\$	USD	
5	Evidence on best practices									
5.1	NEPAD/AOSTI/Sweden review (+++)							12 150	0	Note 9
5.2	Monitoring and Evaluation of the project			X	X			0	0	Note 10
	Sub-total							12 150	0	
6	Resource Mobilization									
6.1	Consultations with partners for mobilizing co-funding (**)			X	X			17 000	0	Note 11
	Sub-total							17 000	0	
7	Final report									
7.1	Programme closure, Technical and Financial reporting writing (***)			X	X			6 000	6 000	Note 12
	Sub-total							6 000	6 000	
	TOTAL							269 808	154 829	

(*) Fully spent for NSTIH & CeSTII to the participation of the African Innovation Summit in February 2014

(**) Fully spent for the participation to the African Innovation Summit in February 2014 (balance) and to cover portion of costs for both the review of ASTII Phase-3 proposal and final editing of AIO-II in Magalies Manor (North West Province, South Africa)

(***) Partially committed for Windhoek database training sessions, March 2014

(+) Partially used (USD19,000) to support the final review of the ASTII Phase 3 Proposal and AIO-2013 in Magalies Manor

(++) Partially used (USD15,000) to sponsor the Africa Innovation Summit in Praia, Cape Verde

(+++ Fully spent for the Sida/NSTIH/AOSTI review meeting in Nairobi, Kenya- February

Budget Notes

Note 1 Disbursing balance (20%) on ASTII grant to Zimbabwe

Note 2 Completion of the 4 ASTII research calls

Note 3 Procurement of database equipment and operationalisation of the database

Note 4 Training of ASTII team on the database management

Note 5 Mass production of AIO-II in English and French

Note 6 Sponsorship to the Africa Innovation Summit (Feb. 2014) & Official launch and dissemination of AIO II

Note 7 Translation in French of AIO-II and 3rd Policy brief

Note 8 Updating of both R&D and Innovation survey instruments

Note 9 Logistics for the Sida-NEPAD review meeting on ASTII

Note 10 Internal M&E by ASTII Secretariat (ongoing)

Note 11 NSTIH discussed with ECOWAS, WIPO and UNIDO in Praia, Cape Verde, to mobilise resources for co-funding the proposed Phase 3

Note 12 Writing of the final Technical and Financial reports up to April 2014

Note 13 Estimated exchange rates - USD/ZAR = 10.50 and SEK/ZAR = 11.12

Annex 4: ASTII Training Sessions, Participants and Achievements

Date & Venue	Number of People - Countries - Achievements - Recommendations - Suggestions
<p>First ASTII Phase-2 Training Workshop Yaoundé, Cameroon (Hotel Franco) 3-6 October 2011</p>	<p>National Experts: 51 Angola (2) Burkina Faso(2) Cameroon (11) Cape Verde (2) Ethiopia (1) Gabon (2) Ghana (1) Kenya (3) Lesotho (1) Liberia (2) Malawi (2) Mali (2), Mozambique (4) Namibia (3) Nigeria (1) Tanzania (2) Togo (2) Tunisia (2) Uganda (1) Zambia (3) Zimbabwe (2)</p> <p>a) Main achievements:</p> <ul style="list-style-type: none"> • ASTII R&D and Innovation standard questionnaire approved by the technical committee and endorsed by AU Member States. ASTII Focal Points to adjust the templates based on their local environment. • Agreement to include emerging issues in new surveys to be carried out by countries involved in ASTII since 2007 (ASTII-1); • Number of countries attending the first ASTII-2 training increased from 19 to 27, namely Cape Verde, Liberia, Mauritius, Namibia, Niger, Togo, Tunisia and Zimbabwe. <p>b) Recommendation from AU Member States to NEPAD: Countries advised NEPAD to attend to the following to improve logistics for future meeting: (i) visa fees; (ii) flights with short and more pleasant itineraries for experts; (iii) invitation letters to be sent out well in advance (at least 2 months but not less than a month), and (iv) exercises to be included in ASTII training modules</p> <p>c) Suggestion from NEPAD & Technical Committee with regard to AIO-2013: As prerequisite, it was suggested to countries to consider the following:</p> <ol style="list-style-type: none"> i. Trust with respondents ii. Secure an official mandate as ASTII National Focal Point iii. Indicators shall be used iv. Common or standard Questionnaires to be followed and adapted where applicable; v. Business and Innovation = cut-off of 10 employees or approximation based on turnover (capital). <p>National Statistics Office to advise Ministries how to use the International Standard Industrial Classification (e.g. ISIC.rev4, ISIC.rev3.1/2, etc.).</p>
<p>Joint NEPAD/CeSTII/UIS Workshop on ASTII Cape Town/South Africa (Southern Sun Newlands), 23-27 April 2012</p>	<p>National Experts: 55 Angola (1) Botswana (2) Burkina Faso (1) Burundi (1) Cameroon (1) Cape Verde (1) Egypt (2) Ethiopia (1) Gabon (1) Ghana (2) Kenya (4) Lesotho (1) Liberia (2) Mali (1) Malawi (2) Mauritius (2) Morocco (1) Mozambique (4) Namibia (4) Niger (2) Nigeria (2) Rwanda (1 but missed) Senegal (2) South Africa (1) Swaziland (1) Tanzania (3) Togo (2) Tunisia (2) Uganda (1) Zambia (2) Zimbabwe (2)</p> <p>Main achievements:</p> <ul style="list-style-type: none"> • COMESA and ECOWAS STI representatives committed to work very close with NEPAD to implement ASTI; • New countries brought to ASTII by the UNESCO Institute for Statistics: Botswana, Morocco and Swaziland. However, Morocco is still out of AU.

Date & Venue	Number of People - Countries - Achievements - Recommendations - Suggestions
ASTII-2 Second Training & Validation workshop, Cairo, Egypt (Grand Nile Towers Hotel), 11-15 February	<p>National Experts: 41 Angola (2) Benin (1) Botswana (1) Burkina Faso (2) Burundi (1) Cameroon (1) Egypt (7) Ethiopia (1) Gabon (1) Ghana (1) Kenya (3) Lesotho (1) Malawi (1) Mali (1) Mauritius (1) Mozambique (3) Namibia (2) Niger (1) Nigeria (1) Senegal (2) South Africa (1) Tanzania (3) Togo (1) Uganda (1) Zimbabwe (1)</p> <p>Main achievements:</p> <ul style="list-style-type: none"> • Agreement on the ASTII roadmap 2013 for the preparation and production of the forthcoming African Innovation Outlook (AIO); • Benin, Botswana, Burundi and Rwanda joined formally to process. Rwanda was once more enable to attend then requested for its in-country training workshop.
1st ASTII in-country workshop for Rwanda joined by Burundi, in Kigali (Lemigo Hotel): 9-11 August 2013	<p>National Experts: 25 Burundi (5) Rwanda (20)</p> <p>Outcome of the mission</p> <ul style="list-style-type: none"> • NEPAD/ASTII staff, UIS and ASTII-1 countries involved as resource persons to own the ASTII process on the continent (Kenya, Nigeria, South Africa and Uganda); • At least 20 Experts from Rwanda trained. Grant Agreement to be signed in due course for the round of R&D and Innovation surveys by the Ministry of Education; • 5 senior officials from Burundi trained and ready to move forward with the national surveys. • Need of technical and in-country training support expressed by Burundi for another training in Bujumbura in Q4. 2013
2nd ASTII in-country workshop for the Republic of Congo and ECCAS countries in Brazzaville, Congo (Ministry of Foreign Affairs): 9-11 September 2013	<p>Only National Experts: 32 Cameroon (5) Chad (3) Republic of Congo (15) Democratic Republic of Congo (5) Equatorial Guinea (2) Gabon (2) </p> <p>Outcome of the mission</p> <ul style="list-style-type: none"> • ASTII participation increased from 32 to 35 AU Member States with the involvement of Chad, Republic of Congo and the Democratic Republic of Congo. • First participation of Equatorial Guinea • ECCAS Deputy Secretary General (Social & Economic Integration) commitment to support the implementation of ASTII in the Central Africa region. • New meeting on ASTII with ECCAS, AMCOST V Chair, AOSTI and NEPAD in Libreville, Gabon by mid-November 2013
3rd ASTII in-country workshop for Burundi in Bujumbura (University of Burundi): 2-3 October 2013	<p>20 National Experts from Burundi</p> <p>Main achievements:</p> <ul style="list-style-type: none"> • Training in French for Burundi Experts by NEPAD and AOSTI staff to build capacity for the ongoing ASTII national surveys • Linkage between the Ministry and national Statistics Office established • Linkage between the Ministry and Higher Education institutions well established
2nd Validation workshop in Cape Town, 11-13 November 2013	<p>AdCom members (Institutions and ASTII National Focal Points)</p> <p>Main Achievements:</p> <ul style="list-style-type: none"> • Data in AIO-II validated • Roadmap for the release of AIO-II approved

Date & Venue	Number of People - Countries - Achievements - Recommendations - Suggestions
4th In-country Training Workshop in Luanda, Angola: 1-3 April 2014	80 Experts from Angola only Main achievements: <ul style="list-style-type: none"> • Reviewed survey instruments with ASTII core team at Ministry of S&T • National expert from provinces and focal point trained on R&D and Innovation survey methodologies and data analysis

Annex 5: ASTII Phase 2 List of Grantees from Jan 2012 – April 2014 (Grant Agreements and Reimbursement in ASTII Phase 2)

SIDA ASTII PHASE 2 LIST OF GRANTEEES FROM JAN 2012 - APR 2014													
#	Name of Grantee	Project Name	Amount of Contract	Funds disbursed to date	ZAR Amount	Date disbursed	Remaining Amount	Date disbursed	2nd Instalment 20% Paid (\$)	2nd Instalment 20% Paid (ZAR)	Audit report submitted Yes/No	No. of countries not submitted	Seq. of Grant Agreements
1	Lesotho Ministry of Communications, Science and Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$15 000.00	\$11 850.00	R 101 317.50	12/06/2012	\$3 150.00				NO	1	1st
2	Republic of Liberia Ministry of Education	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 169 152.00	12/06/2012	\$5 000.00				NO	2	1st
3	Government of Egypt Ministry of Science & Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$50 000.00	\$25 000.00	R 207 250.00	22/06/2012					NOT REQUIRED		
4	Uganda National Council for Science & Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 165 800.00	22/06/2012	\$5 000.00				NO	3	1st
5	Government of Mozambique Ministry of Science & Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 166 800.00	25/06/2012	\$5 000.00				NO	4	1st
6	Malawi Ministry of Education, Science and Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 167 840.00	17/07/2012		\$5 000.00	\$5 000.00	R 51 150.00	YES		1st
7	Federal Government of Nigeria - National Centre for Technology Management (NACETEM)	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 168 600.00	17/07/2012	\$5 000.00				NO	5	1st
8	Burkina Faso Ministry of Science and Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$50 000.00	\$25 000.00	R 212 557.39	30/08/2012					NOT REQUIRED		
9	The United Republic of Tanzania - Ministry of Communication, Science & Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 164 000.00	15/08/2012	\$5 000.00				NO	6	1st

#	Name of Grantee	Project Name	Amount of Contract	Funds disbursed to date	ZAR Amount	Date disbursed	Remaining Amount	Date disbursed	2nd Instalment 20% Paid (\$)	2nd Instalment 20% Paid (ZAR)	Audit report submitted Yes/No	No. of countries not submitted	Seq. of Grant Agreements
10	Senegal Ministry Science and Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 165 200.00	07/08/2012		29/10/2013	\$5 000.00	R 49 903.50	YES		1st
11	Government of Ghana - Science and Technology Policy Research Institute	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 163 978.00	07/08/2012		03/07/2013	\$5 000.00	R 51 681.00	YES		1st
12	The Republic of Togo Ministry of science & Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 165 800.00	10/08/2012		28/05/2013	\$5 000.00	R 49 520.00	YES		1st
13	The Federal Democratic Republic of Ethiopia Ministry of Science & Technology	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 174 200.00	09/10/2012	\$5 000.00				NO	7	1st
14	Zimbabwe National Statistics Agency	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 177 600.00	07/12/2012	\$5 000.00	15/04/2014	\$5 000.00	R 52 950.00	YES		1st
15	Cameroon Ministry of Scientific Research	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 188 864.00	26/03/2013	\$5 000.00				NO	8	1st
16	Republic of Zambia Ministry of Education, Science & Vocational Training	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 180 774.00	05/02/2013	\$5 000.00				NO	9	1st
17	Gabon 1st Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 175 779.47	05/02/2013		04/12/2013	\$5 000.00	R 51 150.00	YES		1st
18	Burundi 1st Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 201 346.00	20/06/2013	\$5 000.00			R 51 150.00	NO	10	1st
19	Niger Ministry of Scientific Research & Innovation - 1st Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 200 840.00	26/08/2013	\$5 000.00				NO	11	1st
20	Gabon 2nd Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 204 600.00	04/12/2013	\$5 000.00				NO	12	2nd

#	Name of Grantee	Project Name	Amount of Contract	Funds disbursed to date	ZAR Amount	Date disbursed	Remaining Amount	Date disbursed	2nd Instalment 20% Paid (\$)	2nd Instalment 20% Paid (ZAR)	Audit report submitted Yes/No	No. of countries not submitted	Seq. of Grant Agreements
21	The Republic of Togo Ministry of Science & Technology - 2nd Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 165 200.00	26/08/2013	\$5 000.00				NO	13	2nd
22	MINISTRE D'ÉTAT CHARGE - REPUBLIQUE DU BENIN - 1st Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 204 026.00	18/11/2013	\$5 000.00				NO	14	1st
23	Senegal Ministry Science and Technology - 2nd Grant Agreement	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 207 320.00	08/11/2013	\$5 000.00				NO	15	2nd
24	Cameroon Ministry of Scientific Research	(ASTII) - National Innovation Survey - ASTII Phase 2	\$25 000.00	\$20 000.00	R 206 500.00	28/08/2013	\$5 000.00				NO	16	2nd
	TOTAL		\$640 000.00	\$481 850.00	R 4 305 344.36		\$83 150.00		\$50 000.00	R 357 504.50			
	YES	6 countries											
	NO	16 countries			\$511 850.00								
	NOT REQUIRED	2 countries											
	TOTAL 1st GRANT AGREEMENT	18 Countries		\$351 850.00									
	TOTAL 1st GRANT AGREEMENT 2nd/20% INSTALLMENTS	6 Countries		\$30 000.00									
	TOTAL 2nd GRANT AGREEMENT	4 Countries		\$80 000.00									
	TOTAL FOR 1st PHASE EGPYPT & BURKINA	2 Countries		\$50 000.00									
	GRAND-TOTAL			\$511 850.00									
	Percentage disbursed			89%									

Annex 6: ASTII Partnership

1. **NESTI/OECD:** The African Union has an observer status at NESTI/OECD with the participation of both NEPAD and AOSTI/AUC. Through this partnership the AU contributes to review and production of the new edition of the Frascati family of Manuals.
2. **ASTI/IFPRI:** The Agricultural Science & Technology Indicators (ASTI) initiative at the International Food Policy Research Institute (IFPRI) compiles, processes, and makes available internationally comparable data on institutional developments and investments in agricultural R&D worldwide, and analyzes and reports on these trends in the form of policy digests. Agriculture is one of the fields of science covered by the ASTII R&D surveys. In 2013, NEPAD ASTII signed an MoU with ASTI/IFPRI to explore statistics on Agriculture. Under this collaboration, ASTII National Focal Points will collect data jointly with their national counterparts involved in ASTI/IFPRI to improve the quality of Agriculture indicators. This also applies to various capacity building programmes between ASTII and ASTI/IFPRI. Through this partnership ASTII has participated in programme planning meetings with ASTI in Entebbe and Dakar in October 2013.
3. **UNESCO Institute for Statistics (UIS):** UIS is the statistical branch of the United Nations Educational Scientific and Cultural Organization. It is hosted by the University of Montreal in Canada. The UIS aims are two-fold: (i) to gather a wide range of quality statistical information to help countries analyze efficiency and effectiveness of their programmes and to inform their policy decisions; (ii) to interpret and report on the global situation with regard to education, science and technology, culture and communication. UIS provides expert support for NEPAD Agency to organize and conduct regional training programmes in STI indicators; gives the NEPAD Agency access to database on S&T statistics for the purpose of advancing ASTII Initiative. Through this partnership the ASTII Coordinator has visited UIS in Montreal in 2013 to familiarize himself with the R & D and Innovation survey instruments and data analysis.
4. **African Development Bank (AfDB):** The AfDB undertakes statistical capacity building activities in African countries. The Bank has prioritized, among others issues, to strengthen statistical capacity to support the monitoring of progress on the MDGs and poverty reduction strategies. The Bank also develops and manages databases on economic, social and development cooperation statistics in Africa. A representative of the statistics department of the Bank is a member of the ASTII TAC. It is expected that by working with the Bank on the ASTII Initiative, the Bank will appreciate the relevance of STI indicators and adjust its strategy to include support to STI as a priority for its intervention in the countries.
5. **AFRICALICS:** The African Network for the Economics of Learning, Innovation, and Competence Building Systems (AfricaLics) was launched in Dar-es-salaam, Tanzania, in March, 2012. It is a network of scholars working on how innovation and competence-building may be harnessed for development in Africa. It is a regional chapter of the world-wide network Globalics. The network's objective is to promote the development of Science Technology and Innovation (STI) research capacity in Africa with strong links to users through research training and research projects. The long term objective of the network is to enable African countries to develop the capacity to study, monitor and evaluate their innovation system and to develop evidence-based policy for the betterment of society.
6. **UNIDO:** Aims to improve the living conditions of people, aspires to reduce poverty through inclusive and sustainable industrial development. It also promotes global prosperity by offering tailor-made solutions for the sustainable industrial development. One of its services is to ensure effectiveness in measuring the impact for result-based mechanisms.

Annex 7: Actions on External Evaluation of ASTII-1

Recommendations		Action
1	It is recommended that during phase 2 and other phases of ASTII NEPAD and its partners should actively engage countries in exploring ways and means of ensuring that R&D and innovation surveys are linked to public policy processes. NEPAD should organize a workshop on the use of STI indicators in policy-making to develop guidelines for using surveys to inform policy formulation, monitoring, evaluation and implementation.	To be handled by the STI Policy Training workshop.
2	It is recommended that NEPAD should (a) undertaken a comprehensive assessment of national capacity needs to establish departments and/or programmes dedicated to STI indicators; (b) develop and make available to all AU Member States guidelines and good practices on how to establish and govern institutions for STI indicators; and (c) work with the (AU) African Observatory for Science, Technology and Innovation (AOSTI) to support countries to establish departments and/or programmes for STI indicators.	a) Commissioned by AOSTI b) A backgrounder on ASTII prepared by NEPAD c) AMCOST IV Bureau recommendations have addressed the problem.
3	NEPAD should design a conceptual framework for future AIO reports and succinct guidelines (outlines) for preparing national reports. It should ensure that future AIO reports are properly technically edited and contain good policy analysis of the data. In addition, NEPAD needs to design a clear strategy for disseminating AIO and related reports as well as policy briefs.	Noted
4	NEPAD should, in collaboration with relevant authorities in the countries, develop clear guidelines for establishing and governing the operations of national focal points. This should include criteria for selecting institutions to host and administer the work of focal points. The guidelines and criteria should be accompanied by a regime for monitoring and evaluating the operations of focal points.	Noted that– we do not have mandate to force countries to work but can give a guide and assist with M&E process.
5	In future, NEPAD should organize or structure ASTII training workshops to focus on capacity building skills for developing and using STI indicators. The workshops should be organized in modules with specific assignments or questions for participants. With the assistance or guidance of the ASTII Advisory Committee established in Phase 2, NEPAD should develop a training guide with specific reading material (key references) to be used in the workshops. These should be sent to participants in advance or before the workshops.	Noted
6	In Phase 2 of ASTII, NEPAD should review the MoUs with University of Lund and UIS. It should also formalize its partnerships with CeSTII, AfDB and IFPRI through MoUs with clear expectations of each of the partners and specific output-based work plans. In addition, NEPAD should have a clear strategy of engaging with the partners on a continuous basis.	AfDB to be approached by AOSTI in order to avoid duplication. NEPAD to find out from the Legal officer if there is any MoU with AfDB. To keep the working relation between CeSTII and ASTII under the NPCA/HSRC 5-year MoU(e.g. The joint MEIDE Conference challenges on procurement could also be addressed in line with such an MoU).

Recommendations		Action
7	If NEPAD is to effectively and efficiently implement ASTII in future, it requires additional staff. It is recommended that the organization should recruit at least two additional full-time technical staff for R&D and innovation surveys. If the current available funding is inadequate to enable NEPAD to recruit two full time staff, it should consider hiring part-time staff to support countries to effectively and efficiently conduct R&D and innovation surveys.	Staffing in both Malabo and Pretoria to be rationalised.
8	To increase efficiency and effectiveness in the implementation of ASTII it is recommended that (a) ASTII programme staff should be well introduced to finance and procurement policies of the AU Commission through a workshop; (b) ASTII programme staff should develop quarterly work plans and discuss as well as agree on these with finance and procurement staff.	Noted for action
9	NEPAD should improve its communication with national focal points, partners and even with the ASTII Advisory Committee. It should have a clear strategy for ensuring that these stakeholders are frequently informed of progress on the implantation of ASTII. It is recommended that NEPAD should hold conference calls every two months with the stakeholders and also produce and disseminate a newsletter on ASTII every three months. Regarding translation of documents: are translated into AU official languages and appropriate interpretations is available at al workshops of ASTII.	Teleconferences were done by the ASTII team.
10	Regarding the provision of technical support to countries to conduct surveys, NEPAD should urgently recruit a full-time ASTII Coordinator to provide technical (and administrative) oversight or leadership for efficient and effective programme implementation. In addition, it should devise a clear strategy to efficiently use the ASTII Advisory Committee (former ASTII Faculty) is adequately involved in supporting countries to implement ASTII activities.	Done
11	To ensure the sustainability of ASTII, it is critical that NEPAD urgently starts a fund raising exercise. This will involve developing a new programme proposal and the identifying and approaching new donors (apart from Sida) to fund the programme for Africa are the John and Catherine MacArthur Foundation, the Bill and Melinda Gates Foundation (BMGF), Governments of Finland and the Netherlands, and the European Union (EU).	Already under discussion
12	The sustainability of ASTII depends on African countries' commitment to establishing national STI indicators programmes and adequately resourcing such programmes. NEPAD, AOSTI and the AU Commission (AUC) should start a process of building policy-makers' and political leaders' awareness of the critical importance of national STI indicators programmes. They should cause the African Ministerial Conference on Science and Technology (AMCOST) and the AU Summit to make decisions that will oblige all Member States of the AU to establish and adequate fund national STI indicators programmes.	Outreach activities to be increased in 2013

Recommendations		Action
13	The success of any fund raising efforts for ASTII will depend on how well NEPAD and AOSTI work together to establish clear institutional responsibilities for STI indicators programme(s) for Africa. AOSTI and NEPAD should jointly develop a new five year ASTII programme (see recommendation 11) to be implemented by both organizations, each having clear responsibilities based on their differentiated capacities.	Agreed and action has been taken

Annex 8: Income and Expenditure Statements 1 July 2010-30 Sept 2012



NEW PARTNERSHIP FOR AFRICA'S DEVELOPMENT
ASTII PROGRAMME
FUNDED BY SWEDISH INTERNATIONAL DEVELOPMENT COOPERATION AGENCY
CONTRIBUTION NO.75007368

INCOME AND EXPENDITURE STATEMENT
FOR THE PERIOD 1 JULY 2010 TO 30 SEPTEMBER 2012

Figures in Rands	Actual			Budget	Variance
	Year to date	Current (Jan- Sep 2012)	June 2010- Dec 2011)		
INCOME					
Funding Balance Brought Forward					
Funding Received	13 150 524	7 432 758	13 150 524	13 150 524	-
Interest received	364 546	157 428	207 118	0	364 546
Total Income	13 515 071	7 590 187	13 357 642	13 150 524	364 546
EXPENDITURE					
Personnel Costs	2 668 313	1 019 345	1 648 969	3 935 414	1 267 101
Support national surveys	2 482 565	2 018 295	464 270	5 468 300	2 985 735
Capacity building on STI indicators	4 934 282	1 374 924	3 559 358	5 651 800	717 518
Dissemination of ASTII information	319 617	67 330	252 287	2 495 600	2 175 983
Evidence on best practices	343 346	343 346	-	330 300	(13 046)
RPI Services and Experts Group	-	-	-	1 742 553	1 742 553
Total Expenditure	10 748 123	4 823 239	5 924 884	19 623 967	8 875 844
Surplus as at 30 September 2012	2 766 948	2 766 947.48	7 432 758.28		

Note

Exchange rate used for Budget figures is based on the budget rate.

Exchange rate used for actual amount is based on the average spot rates of the funds received dates.

APPROVAL

The above income and expenditure statement is approved

Kossi Toulassi

Head of Finance: NEPAD Planning and Coordinating Agency





NEPAD PLANNING & COORDINATING AGENCY (NPCA)
 ASTII PHASE II PROGRAMME
 FUNDED BY THE SWEDISH INTERNATIONAL DEVELOPMENT & COOPERATION AGENCY (SIDA)
 CONTRIBUTION NO.75007368

INCOME AND EXPENDITURE STATEMENT
 FOR THE YEAR PERIOD 01 JULY 2010 TO 30 SEPTEMBER 2012

Figures in Rands & Swedish Krona

	YEAR TO DATE				YEAR TO DATE			
	Actual		Actual		Budget		Variance	
	Jan-Sep 2012	July10-Dec2011	YTD	R	R	R	R	
INCOME								
Fund brought forward	7 432 756							
Funding Received		13 150 524	13 150 524	13 150 524				
Interest received	157 428	207 118	364 546	364 546				
Total Income	7 590 186	13 357 642	13 515 071	13 150 524	364 546	12 592 000	353 610	
EXPENDITURE								
Personnel Costs	1 019 345	1 648 969	2 668 313	3 935 414	1 267 101	3 784 052	1 216 366	
Support national surveys	2 018 295	464 270	2 482 565	5 468 300	2 985 735	5 257 961	2 870 699	
Capacity building on STI indicators	1 374 924	3 559 358	4 934 282	5 651 800	717 516	5 434 423	689 621	
Dissemination of ASTII information	67 330	252 287	319 617	2 485 600	2 175 983	2 389 615	2 092 292	
Evidence on best practices	343 346	-	343 346	330 300	-13 046	317 596	-12 544	
RPI Services and Experts Group	-	-	0	1 742 553	1 742 553	1 675 531	1 675 531	
Total Expenditure	4 823 239	5 924 884	10 748 123	19 623 967	8 875 844	18 869 199	8 534 466	
Surplus For Current Period	2 766 947	7 432 758	2 766 948		2 610 877			



Actual Funding Exchange Rate
 ZAR/IKR 7.84
 USD/IKR 7.51
 USD/R 7.34
 R/SEK 1.05
 USD/IKR 7.89


Funds received from SIDA Phase II July 2010 - September 2012

Date Received	Description	RAND Value	SWEDISH KRONA Value	DOLLAR Value
13/12/2010	1st disbursement upon signature of agreement	7 791 204	8 000 000	1 040 678
14/12/2011	2nd disbursement allocated to year 2011 as per agreement	5 359 321	4 592 000	636 499
Total		13 150 524	12 592 000	1 677 177

Annex 9: Income and Expenditure Statements 1 July 2010-31 December 2012



NEW PARTNERSHIP FOR AFRICA'S DEVELOPMENT
 ASTII PROGRAMME
 FUNDED BY SWEDISH INTERNATIONAL DEVELOPMENT COOPERATION AGENCY
 CONTRIBUTION NO.7507368

INCOME AND EXPENDITURE STATEMENT
 FOR THE PERIOD 1 JULY 2010 TO 31 DECEMBER 2012

Figures in Rands	Actual			Budget (Jul 2010 - Dec 2012)	Variance
	Year to date	Current (Jan- Dec 2012)	Jul 2010- Dec 2011)		
INCOME					
Funding Balance Brought Forward		7 432 758.28		21 734 647	-
Funding Received	21 734 647	6 584 123.02	13 150 524	21 734 647	0
Interest received	402 311	185 193.10	207 118	0	402 311
Total Income	22 136 958	18 212 074	13 357 642	21 734 647	402 311
EXPENDITURE					
Personnel Costs	3 255 215	1 609 246	1 648 969	3 935 414	677 199
Support national surveys	2 834 385	2 370 095	464 270	5 466 300	2 633 935
Capacity building on STI Indicators	4 687 160	1 127 802	3 559 358	5 651 800	964 640
Dissemination of ASTII information	422 915	170 628	252 287	2 936 000	2 613 085
Evidence on best practices	384 081	384 081	-	330 300	(53 781)
RPI Services and Experts Group	-	-	-	-	-
Total Expenditure	11 586 736	5 661 852	5 924 884	18 321 814	6 735 079
Surplus as at 31 December 2012	10 550 222	10 550 222.54	7 432 758.28		

Note

Exchange rate used for Budget figures is based on the budget rate.

Exchange rate used for actual amount is based on the average spot rates of the funds received dates.

APPROVAL

The above income and expenditure statement is approved by:

Kossi Toulassi

Head of Finance: NEPAD Planning and Coordinating Agency

NEPAD PLANNING & COORDINATING AGENCY (NPCA)
ASTII PHASE II PROGRAMME
FUNDED BY THE SWEDISH INTERNATIONAL DEVELOPMENT & COOPERATION AGENCY (SIDA)
CONTRIBUTION NO.7507268



INCOME AND EXPENDITURE STATEMENT
FOR THE YEAR PERIOD 01 JULY 2010 TO 31 DECEMBER 2012

Figures in Rands & Swedish Krona

	YEAR TO DATE					YEAR TO DATE		
	Actual Jan-Dec 2012 R	Actual July2010-Dec2011 R	Actual YTD R	Budget R	Variance R	Actual YTD SEK	Budget SEK	Variance SEK
INCOME								
Fund brought forward	7 432 758							
Funding Received	8 584 123	13 150 524	21 734 647	13 150 524		19 414 000	19 414 000	-
Interest received	105 193	207 118	402 311		402 311	390 241		390 241
Total Income	16 212 074	13 357 642	22 136 958	13 150 524	402 311	19 804 241	19 414 000	390 241
EXPENDITURE								
Personal Costs	1 009 240	1 048 969	3 258 215	3 925 414	677 199	2 909 121	4 123 070	1 213 949
Support national surveys	2 370 095	484 270	2 854 365	5 408 300	2 633 935	2 530 683	5 729 000	3 198 317
Capacity building on STI Indicators	1 127 802	3 599 358	4 687 160	5 651 800	964 640	4 184 064	3 679 000	-1 108 964
Dissemination of ASTII Information	170 628	252 287	422 915	2 936 000	2 513 085	377 003	3 676 000	2 698 997
Evidence on best practices	364 081	-	364 081	330 300	-33 781	342 829	346 000	3 171
RPI Services and Experts Group	-	-	-	0	0	-	0	0
Total Expenditure	5 661 852	5 924 884	11 586 726	18 321 814	8 735 079	18 345 360	16 356 170	6 004 871
Surplus For Current Period	10 550 222	7 432 758	10 550 222			9 458 881		

Actual Funding Exchange Rate	USDR	8.10
	ZAR/KR	1.12
	USD/KR	7.24
Budget Contract Date Exchange Rate	USDR	7.34
	R/SEK	1.05
	USD/KR	7.95

(2)



Funds received from SIDA Phase II July 2010 - December 2012

Date Received	Description	RAND Value	SWEDISH KRONA Value	DOLLAR Value
13/12/2010	1st disbursement upon signature of agreement	7 791 204	8 000 000	1 040 678
14/12/2011	2nd disbursement allocated to year 2011 as per agreement	5 359 321	4 592 000	636 499
19/12/2012	3rd disbursement allocated to year 2012 as per agreement	8 584 123	6 822 000	1 006 160
Total		21 734 647	19 414 000	2 683 337

Funds received exchange rate USD/ZAR

8.10

ZAR/KR

1.12

USD/KR

7.24

Annex 10: Income & Expenditure Statements for the period 1 July 2010 - 31 December 2013



NEW PARTNERSHIP FOR AFRICA'S DEVELOPMENT
ASTII PROGRAMME
FUNDED BY SWEDISH INTERNATIONAL DEVELOPMENT COOPERATION AGENCY
CONTRIBUTION NO.75007368

INCOME AND EXPENDITURE STATEMENT
FOR THE PERIOD 1 JULY 2010 TO 31 DECEMBER 2013

Figures in Rands	Year to date (Jul2010- Dec2013)	Current (Jan- Dec 2013)	(Jan-Dec 2012)	Jun 2010-Dec 2011	Budget	Variance
INCOME						
Funding Balance Brought Forward		10 203 034	7 432 757.99			
Funding Received	25 109 907	3 375 260	8 584 123.02	13 150 524	25 109 907	-
Interest received	658 070	255 759	195 193.10	207 118	658 070	-
Total income	25 767 977	13 834 053	16 212 074	13 357 642	25 767 977	0
EXPENDITURE						
Personnel Costs	5 636 595	2 526 242	1 461 384	1 648 969	5 911 460	274 865
Support national surveys	8 174 515	4 970 513	2 739 733	464 270	8 018 300	(156 215)
Capacity building on STI indicators	7 133 096	2 321 262	1 252 476	3 559 368	8 669 300	1 536 204
Dissemination of ASTII Information	1 786 438	1 362 784	171 366	252 267	5 358 500	3 572 062
Evidence on best practices	384 081	-	384 081	-	585 300	201 219
RPI Services and Experts Group	-	-	-	-	-	-
Total Expenditure	23 114 725	11 180 801	6 009 040	5 924 884	28 542 860	5 428 136
Surplus as at 31 Dec 2013	2 653 252.19	2 653 252.19	10 203 034.23	7 432 757.99		

Note

Exchange rate used for Budget figures is based on the budget rate.

Exchange rate used for actual amount is based on the average spot rates of the funds received dates.

APPROVAL

The above income and expenditure statements are approved by

Kossi Youlassi

Head of Finance: NEPAD Planning and Coordinating Agency



NEPAD PLANNING & COORDINATING AGENCY (NPPCA)
 ASTII PHASE II PROGRAMME
 FUNDED BY THE SWEDISH INTERNATIONAL DEVELOPMENT & COOPERATION AGENCY (SIDA)
 CONTRIBUTION NO. 75007368



INCOME AND EXPENDITURE STATEMENT
 FOR THE YEAR PERIOD 01 JULY 2010 TO 31 DECEMBER 2013

Figures in Rands & Swedish Krona

	YEAR TO DATE										YEAR TO DATE						
	Actual YTD Jul2010- Dec2013		Actual Jan-Dec 2013		Actual Jan-Dec 2012		Actual July2010- Dec2011		Actual YTD Jul2010- Dec2012		Actual YTD SEK		Budget SEK		Variance SEK		
	R	R	R	R	R	R	R	R	R	R	R	R	R	R	R	R	
INCOME																	
Fund brought forward			10 203 034	7 432 750													
Funding Received	25 100 907	3 375 200	3 375 200	6 594 123	13 150 524	21 734 647	25 109 907	0									
Interest received	658 070	255 759	255 759	195 193	207 118	402 311	658 070										
Total Income	25 767 977	3 630 959	13 834 053	16 212 074	13 357 642	22 136 958	25 109 907	658 070									
EXPENDITURE																	
Personnel Costs	8 636 595	2 526 242	2 526 242	1 461 394	1 648 969	3 110 353	5 911 490	274 865									
Support national surveys	8 174 515	4 970 513	4 970 513	2 739 733	464 270	3 204 003	8 018 300	-156 215									
Capacity building on STI indicators	7 133 096	2 321 262	2 321 262	1 252 476	3 559 358	4 611 834	8 669 300	1 536 204									
Dissemination of ASTII information	1 786 438	1 362 784	1 362 784	171 306	252 287	423 653	5 368 500	3 572 062									
Evidence on best practices	384 081			384 081		384 081	585 300	201 219									
RPI Services and Experts Group								0									
Total Expenditure	23 114 725	11 180 801	11 180 801	6 009 040	5 924 854	11 933 924	28 542 860	6 428 136									
Surplus For Current Period	2 653 252	2 653 252	2 653 252	10 203 034	7 432 788	10 203 034											
Actual Funding Exchange Rate																	
Budget Contract Date Exchange Rate																	



USD/R 8.10
 ZAR/KR 1.12
 USD/KR 7.24
 USD/R 7.34
 R/SEK 1.06
 USD/KR 7.89



Funds received from SIDA Phase II July 2010 - December 2013

Date Received	Description	RAND Value	SWEDISH KRONA Value	DOLLAR Value
13/12/2010	1st disbursement upon signature of agreement	7 791 204	8 000 000	1 040 678
14/12/2011	2nd disbursement allocated to year 2011 as per agreement	5 359 321	4 592 000	636 499
2012/12/19	3rd disbursement allocated to year 2012 as per agreement	8 584 123	6 822 000	1 006 160
2013/06/26	4th disbursement allocated to year 2013 as per agreement	R 3 375 260.01	2 322 000.00 kr	\$336 248.00
Totals		25 109 907	21 736 000	3 019 685

Funds received exchange rate USD/ZAR

8.10

ZAR/KR

1.12

USD/KR

7.24



Annex 11: Income and Expenditure Statement for the Period 1 July 2010-30 April 2014


NEW PARTNERSHIP FOR AFRICA'S DEVELOPMENT
 A STII PROGRAMME
 FUNDED BY SWEDISH INTERNATIONAL DEVELOPMENT COOPERATION AGENCY
 CONTRIBUTION NO.75007368
 INCOME AND EXPENDITURE STATEMENT
 FOR THE PERIOD 1 JULY 2010 TO 22 APRIL 2014

Figures in Rands	Actual					Budget	Variance
	Year to date (Jul2010-22 Apr2014)	4 Months (Jan 2014-22 Apr2014)	YTD (Jul2010-Dec2013)	Year (Jul2010-Dec2012)	Current (Jan-Dec 2013)		
INCOME							
Funding Balance Brought Forward	25 109 907.03	2 842 116			22 162 418		
Funding Received	-	-	25 109 907	21 734 647	3 376 260	21 734 647	-
Interest received	674 241	16 171	656 070	402 311	255 759	0	402 311
Total Income	25 784 148	2 858 287	25 767 977	22 136 958	25 793 436	21 734 647	402 311
EXPENDITURE							
Personnel Costs	6 530 217	893 622	5 636 585	3 110 563	2 626 242	5 911 460	274 585
Support national surveys	7 831 960	(153 702)	7 885 681	3 204 003	4 781 649	8 015 300	32 649
Capacity building on STI indicators	7 390 462	257 366	7 133 096	4 811 834	2 921 262	8 669 300	1 536 204
Dissemination of A STII information	2 888 961	802 623	1 786 438	423 663	1 362 784	6 368 600	3 572 062
Evidence on best practices	594 009	209 920	364 081	364 081	-	565 300	201 219
RPI Services and Experts Group	-	-	-	-	-	-	-
Total Expenditure	24 335 609	2 009 738	22 825 861	11 933 924	10 881 337	28 542 960	5 617 000
Surplus as at 22 Apr 2014	848 548.00	848 548.00	2 842 116.16	10 203 034.14	14 912 099.31		

Note :

Exchange rate used for Budget figures is based on the budget rate.

Exchange rate used for actual amount is based on the average spot rates of the funds received dates.

APPROVAL

The above income and expenditure statement is approved by:

.....
Kossi Toulassi

Head of Finance: NEPAD Planning and Coordinating Agency

Date Received	Description	RAND Value	SWEDISH KRONA Value	DOLLAR Value
13/12/2010	1st disbursement upon signature of agreement	7 791 204	8 000 000	1 040 678
14/12/2011	2nd disbursement allocated to year 2011 as per agreement	5 359 321	4 592 000	636 499
2012/12/19	3rd disbursement allocated to year 2012 as per agreement	8 584 123	6 822 000	1 006 160
2013/06/26	4th disbursement allocated to year 2013 as per agreement	R 3 375 260.01	2 322 000.00kr	\$336 248.00
Total		25 109 907	21 736 000	3 019 585

Funds received exchange rate USD/ZAR 8.10
 ZAR/KR 1.12
 USD/KR 7.24

Annex 12: 1st Audit Report for the period 1 July 2010-31 December, 2011

**INDEPENDENT AUDITORS REPORT****TO THE NEPAD PLANNING AND COORDINATING AGENCY (NPCA) ON THE FUNDS RECEIVED FROM THE SWEDISH INTERNATIONAL CO-OPERATION AGENCY – CONTRIBUTION NO. 75007368**

We have audited the accompanying project statement of income and expenditure of the grant from the Swedish International Development Co-operation Agency (Contribution no. 75007368, which comprise of the income and expenditure statement for the period 1 July 2010 to 31 December 2011. The projects statement of income and expenditure is prepared by NPCA based on Article 8 of the Agreement between NPCA and the Swedish International Development Co-operation Agency.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation the project income and expenditure statement in accordance with the financial reporting provisions of Article 8 of the Agreement, and for such internal control as management determines is necessary to enable the preparation of the projects statement of income and expenditure that are free from material misstatement, whether due to fraud or error.

Auditors' Responsibility

Our responsibility is to express an opinion on the project income and expenditure statement based on our audit. We conducted our audit in accordance with International Standards on Auditing. Those standards require that we comply with ethical requirements and plan and perform the audit to obtain reasonable assurance whether the project statement of income and expenditure is free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the project statement of income and expenditure. The procedures selected depend on the auditors' judgement, including the assessment of the risks of material misstatement of the project statement of income and expenditure, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the project statement of income and expenditure in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of accounting estimates made by management, as well as evaluating the overall presentation of the project income and expenditure statement.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

HEAD OFFICE
20 Morris Street East, Woodmead, 2191
P.O. Box 2939, Saxonoord, 2132
Tel: +27 (0) 11 238 0600
Fax: +27 (0) 11 234 0933
www.sizwentsalubagobodo.co.za

JOHANNESBURG OFFICE
41 West Street, Houghton, 2041
P.O. Box 87452, Houghton, 2041
Tel: +27 (0) 11 718 8600
Fax: +27 (0) 11 718 8601
www.sizwentsalubagobodo.co.za

In our opinion, the attached project income and expenditure statement for the period 1 July 2010 to 31 December 2011 is prepared, in all material respects, in accordance with the financial reporting provisions of Article 8 of the Agreement.

Further audit procedures were designed to provide a reasonable basis of our opinion on the following specific matters listed below:

- a) Examining, assessing and reporting on compliance with the terms and conditions of the agreement stated above and applicable laws and regulations regarding accounting and taxes.
- b) Examining on a test basis, evidence supporting the amounts received and disbursed in the projects statement of income and expenditure.
- c) Examine if NPCA has agreements with organisations to which it channels parts of the funds and whether NPCA has followed SIDA's audit requirements and have acted on the received audit reports from these organisations.

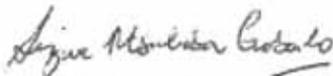
We report that:

- a) With respect to item 'a', we found that the expenses complied with the contractual agreement between SIDA and the NPCA. NPCA complied with the applicable laws and regulations regarding accounting and taxes.
- b) With respect to item 'b', we inspected the validity and accuracy of the supporting documentation on the expenditure incurred as shown in the attached project statement of income and expenditure. These were found to be valid and accurate.
- c) With respect to item 'c', we found that there were no agreements signed with other organisations.

Basis of Accounting and Restriction on Distribution of Use

Without modifying our opinion, we draw attention to fact that the project income and expenditure statement is prepared to assist NPCA to comply with the financial reporting provisions of the Agreement referred to above.

As a result, the project statement of income and expenditure may not be suitable for another purpose. Our report is intended solely for the NPCA and should not be distributed to or used by parties other than the above mentioned.



SizweNtsalubaGobodo
Registered Auditors

Per: Loganathan Govender
Director
Johannesburg
8 June 2012

**INCOME AND EXPENDITURE STATEMENT
FOR THE PERIOD 1 JULY 2010 TO 31 DECEMBER 2011**

Figures in Rands	Actual	Budget	Variance
INCOME			
Funding Received	13 150 524	13 150 524	-
Interest received	207 118	-	207 118
Total Income	13 357 642	13 150 524	207 118
EXPENDITURE			
Personnel Costs	1 648 969	2 361 249	712 280
Support national surveys	464 270	3 904 880	3 440 610
Capacity building on STI indicators	3 559 358	3 890 200	330 842
Dissemination of ASTII information	252 287	1 468 000	1 215 713
Evidence on best practices	-	258 900	258 900
RPI Services and Experts Group	-	1 045 532	1 045 532
Total Expenditure	5 924 884	12 926 761	7 001 877
Surplus as at 31 December 2011	7 432 758		

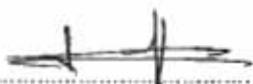
Note

Exchange rate used for Budget figures is based on the budget rate.

Exchange rate used for actual amount is based on the average spot rates of the funds received dates.

APPROVAL

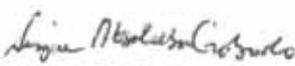
The above income and expenditure statement is approved by:



Kossi Toulassi
Head of Finance: NEPAD Planning and Coordinating Agency



Dr. Ibrahim Assane Mayaki
Chief Executive Officer: NEPAD Planning and Coordinating Agency


SIZWENTSALUBAGOBODO
20 MORRIS EAST STREET
WOODMEAD EXT. WOODMEAD
P.O. BOX 2939 SAXONWOLD 2132
TEL: 011 231 0600 FAX: 011 234 0983

Annex 13: 2nd Audit Report for the period 1 July 2010 – 31 December, 2012

**INDEPENDENT AUDITORS REPORT****TO THE NEPAD PLANNING AND COORDINATING AGENCY (NPCA) ON THE FUNDS RECEIVED FROM THE SWEDISH INTERNATIONAL CO-OPERATION AGENCY – CONTRIBUTION NO. 75007368**

We have audited the accompanying project statement of income and expenditure of the grant from the Swedish International Development Co-operation Agency (Contribution no. 75007368), which comprise of the income and expenditure statement for the period 1 July 2010 to 31 December 2012. The projects statement of income and expenditure is prepared by NPCA based on Article 8 of the Agreement between NPCA and the Swedish International Development Co-operation Agency.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation the project income and expenditure statement in accordance with the financial reporting provisions of Article 8 of the Agreement, and for such internal control as management determines is necessary to enable the preparation of the projects statement of income and expenditure that are free from material misstatement, whether due to fraud or error.

Auditors' Responsibility

Our responsibility is to express an opinion on the project income and expenditure statement based on our audit. We conducted our audit in accordance with International Standards on Auditing. Those standards require that we comply with ethical requirements and plan and perform the audit to obtain reasonable assurance whether the project statement of income and expenditure is free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the project statement of income and expenditure. The procedures selected depend on the auditors' judgement, including the assessment of the risks of material misstatement of the project statement of income and expenditure, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the project statement of income and expenditure in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of accounting estimates made by management, as well as evaluating the overall presentation of the project income and expenditure statement.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

<p>HEAD OFFICE 20 Morris Street East, Woodmead, 2091 P.O. Box 2939, Sandton, 2012 Tel: +27 (0) 11 234 0600 Fax: +27 (0) 11 234 0933 www.sizwenantsalubagobodo.co.za</p>	<p>JOHANNESBURG OFFICE 41 West Street, Houghton, 2041 P.O. Box 61452, Houghton, 2041 Tel: +27 (0) 11 718 9600 Fax: +27 (0) 11 718 9601 www.sizwenantsalubagobodo.co.za</p>
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In our opinion, the attached project income and expenditure statement for the period 1 July 2010 to 31 December 2012 is prepared, in all material respects, in accordance with the financial reporting provisions of Article 8 of the Agreement.

Further audit procedures were designed to provide a reasonable basis of our opinion on the following specific matters listed below:

- a) Examining, assessing and reporting on compliance with the terms and conditions of the agreement stated above and applicable laws and regulations regarding accounting and taxes.
- b) Examining on a test basis, evidence supporting the amounts received and disbursed in the projects statement of income and expenditure.
- c) Examine if NPCA has agreements with organisations to which it channels parts of the funds and whether NPCA has followed SIDA's audit requirements and have acted on the received audit reports from these organisations.

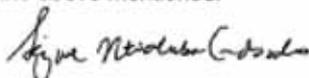
We report that:

- a) With respect to item 'a', we found that the expenses complied with the contractual agreement between SIDA and the NPCA. NPCA complied with the applicable laws and regulations regarding accounting and taxes.
- b) With respect to item 'b', we inspected the validity and accuracy of the supporting documentation on the expenditure incurred as shown in the attached project statement of income and expenditure. These were found to be valid and accurate.
- c) With respect to item 'c', we found that there were 16 agreements signed with other organisations for grant disbursements. Disbursement of 80% of the approved grant value only commenced in the current financial period and were for the African Science, Technology and Innovation Indicators Initiative (ASTII) - National Innovation Surveys - ASTII Phase 2 projects. All projects are still in progress and final audit certificates will only be received after the completion of the projects.

Basis of Accounting and Restriction on Distribution of Use

Without modifying our opinion, we draw attention to fact that the project income and expenditure statement is prepared to assist NPCA to comply with the financial reporting provisions of the Agreement referred to above.

As a result, the project statement of income and expenditure may not be suitable for another purpose. Our report is intended solely for the NPCA and should not be distributed to or used by parties other than the above mentioned.



Sizwe Ntsaluba Gobodo
Registered Auditors

Per: Loganathan Govender
Director
Johannesburg
23 April 2013

SIZWENTSALUBAGOBODO
 20 MORRIS EAST STREET
 WOODMEAD EXT, WOODMEAD
 P.O. BOX 2939 SAXONWOLD 2132
 TEL: 011 231 0600 FAX: 011 234 0933



NEW PARTNERSHIP FOR AFRICA'S DEVELOPMENT
ASTII PROGRAMME
 FUNDED BY SWEDISH INTERNATIONAL DEVELOPMENT COOPERATION AGENCY
 CONTRIBUTION NO.75007368

INCOME AND EXPENDITURE STATEMENT
FOR THE PERIOD 1 JULY 2010 TO 31 DECEMBER 2012

Description	Actual			Budget	Variance
	Year to date	Current (Jan-Dec 2012)	June 2010-Dec 2011)		
	Rand	Rand	Rand	Rand	Rand
INCOME					
Funding Balance Brought Forward		7 432 758			
Funding Received	21 734 647	8 584 123	13 150 524		
Interest received	402 311	185 193	207 118		
Total Income	22 136 958	16 212 074	13 357 642	-	-
EXPENDITURE					
Personnel Costs	3 110 353	1 461 384	1 648 969	3 935 414	825 061
Support national surveys	3 204 003	2 739 733	464 270	5 468 300	2 264 297
Capacity building on STI indicators	4 811 834	1 252 476	3 559 358	5 651 800	839 968
Dissemination of ASTII information	423 653	171 366	252 287	2 936 000	2 512 347
Evidence on best practices	384 081	384 081	-	330 300	(53 781)
RPI Services and Experts Group	-	-	-	-	-
Total Expenditure	11 833 824	6 909 040	5 924 884	18 321 814	6 387 881
Surplus as at 31 December	10 203 034	10 203 035	7 432 758		

Note.

Exchange rate used for Budget figures is based on the budget rate.

Exchange rate used for actual amount is based on the average spot rates of the funds received dates.

Approved by:



 23/04/2013

Kitemano Mbillanyi
 Acting Head of Finance: NEPAD Planning and Coordinating Agency

23 April 2013

NEPAD Planning and Coordinating Agency
New Road & 6th Road
Midridge Office Park
c/o Challenger & Columbia Avenue
Block B
Midrand
1685

Attention: Mr Kossi Toulassi
SWEDISH INTERNATIONAL DEVELOPMENT COOPERATION AGENCY—CONTRIBUTION NO.75007368

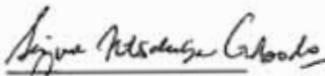
Dear Sir,

During the course of our audit of the books and records of the Swedish International Development Cooperation Agency (Contribution no. 75007368) for the period 1 July 2010 to 31 December 2012, we have performed the procedures agreed with you with respect to the funding of the Swedish International Development Cooperation Agency. Our engagement was undertaken in accordance with the International Standard on Related Services applicable to agreed-upon procedures engagements. The procedures were performed solely to assist you in evaluating the funding provided in respect of the Swedish International Development Cooperation Agency.

There have been no matters which came to our notice during the conduct of our agreed upon procedures audit. Had we performed additional procedures or had we performed an audit or review of the financial statements in accordance with International Standards on Auditing or International Standards on Review Engagements, other matters might have come to our attention that would have been reported to you.

We wish to take this opportunity to express our appreciation of the co-operation and courtesy extended to us by your staff during the course of our audit.

Yours faithfully,



SizweNtsalubaGobodo Inc.
Registered Auditors

Per: Loganathan Govender
Chartered Accountant (SA)
Director

HEAD OFFICE
20 Morris Street East, Woodmead, 2191
P.O. Box 2939, Sasolwast, 2132
Tel: +27 (0) 11 231 0600
Fax: +27 (0) 11 234 0933
www.sizwenntsalubagobodo.co.za

JOHANNESBURG OFFICE
41 West Street, Houghton, 2041
P.O. Box 67452, Houghton, 2041
Tel: +27 (0) 11 718 8600
Fax: +27 (0) 11 718 8601
www.sizwenntsalubagobodo.co.za

