

Introduction

The World Summit on the Information Society (WSIS) recognized information and communication Technologies (ICTs) as transformational technologies and as important enablers for social and economic development. Besides representing an important sector, ICTs enable economic growth and have strategic spillover effects on other sectors. They create jobs and foster innovation, empower people through new and faster communication channels, and help create greater access to education, healthcare and public services. While ICTs have grown tremendously and an increasing number of people are joining the global information society, major differences in ICT uptake and use persist – the digital divide therefore remains a key impediment to development.

To enhance the development of a global information society, increased attention has been given to the importance of tracking, monitoring and addressing the digital divide. The Partnership for Measuring ICT for Development (the *Partnership*) has been leading this task within the framework of the WSIS, since 2004. The *Partnership's* efforts have improved the quality and quantity of ICT statistics worldwide, helped develop better tools to support countries to collect ICT data, and raised awareness about the importance of measurement. The *Partnership* has also contributed to the follow-up and implementation of the outcomes of the WSIS, and has taken on responsibility for tracking the WSIS targets.

The main objective of this report, *Final WSIS Targets Review. Achievements, Challenges and the Way Forward*, is to provide policy-makers with a comprehensive evaluation of the implementation of the WSIS commitments, and in particular the WSIS targets. It emphasizes the importance of ICTs for development, and the need to track these. The report is expected to highlight the lessons learnt from the WSIS monitoring process and to deliver an input to the debate on the post-2015 agenda, including discussion of possible targets and future indicators.

Background on the WSIS and the WSIS targets

The first two phases of the WSIS were held in 2003 in Geneva, Switzerland and in 2005 in Tunis, Tunisia. They brought together governments, private sector, civil society and international organizations from around the globe to set a common vision for building an inclusive information society. In accordance with the Millennium Development Goals (MDGs), the Geneva phase agreed on a *Declaration of Principles* and a *Plan of Action*, with ten targets and several action lines to be achieved by 2015. In Tunis, major stakeholders reaffirmed their support for the outcomes of the first phase of the WSIS and approved the Tunis *Commitment and Agenda*, along with the establishment of the Internet Governance Forum (IGF).

The Geneva *Plan of Action* promotes the use of ICTs for the achievement of internationally agreed development goals and targets. With special attention to developing countries, the ten targets of the *Plan of Action* had the following goals:

- encouraging connectivity – in villages, educational institutions, scientific and research centres, public libraries, cultural centres, museums, post offices, archives, health centres, hospitals and government departments;

- adapting primary and secondary school curricula to meet the challenges of the information society;
- ensuring access by the world's population to ICTs, including television and radio;
- supporting the development of content and facilitating the presence and use of all world languages on the Internet.

The ITU *World Telecommunication/ICT Development Report 2010: Monitoring the WSIS Targets, A mid-term review* (WTDR) (ITU, 2010) recommended that a new target “Connect all businesses with ICTs” should be added to the WSIS targets; three indicators were identified by the *Partnership* to track such a target (see *Measuring the WSIS Targets. A statistical framework, Partnership, 2011*). At the same time, the *Partnership* recommended some changes to the wording of the targets, mainly in order to improve their measurability (see Box 0.1).

The WSIS targets have served as global reference for improving global access and use of ICTs and have provided benchmark indicators for the evaluation of the overall objectives of the information society. In addition, the WSIS targets were intended to inspire particular targets at national level based on local characteristics, e-strategies and development policies.

Box 0.1: Amended WSIS targets¹

Target 1. Connect all villages with ICTs and establish community access points;

Target 2. Connect all secondary schools and primary schools with ICTs;

Target 3. Connect all scientific and research centres with ICTs;

Target 4. Connect all public libraries, museums, post offices and national archives with ICTs;

Target 5. Connect all health centres and hospitals with ICTs;

Target 6. Connect all central government departments and establish websites;

Target 7. Adapt all primary and secondary school curricula to meet the challenges of the information society, taking into account national circumstances;

Target 8. Ensure that all of the world's population has access to television and radio services;

Target 9. Encourage the development of content and put in place technical conditions in order to facilitate the presence and use of all world languages on the Internet;

Target 10. Ensure that more than half the world's inhabitants have access to ICTs within their reach and make use of them;

Proposed Target 11: Connect all businesses with ICTs.

Source: Partnership on Measuring ICT for Development (2011).

WSIS monitoring and evaluation

WSIS highlighted the importance of internationally comparable ICT statistics to benchmark and monitor the progress made towards creating a global information society. It made specific reference to a follow-up mechanism and appropriate indicators to track global progress in the use of ICT (see Box 0.2).

Box 0.2: Call for follow-up process in WSIS documents

Geneva *Plan of Action* (2003), paragraph 28

“A realistic international performance evaluation and benchmarking (both qualitative and quantitative), through comparable statistical indicators and research results, should be developed to follow up the implementation of the objectives, goals and targets in the *Plan of Action*, taking into account different national circumstances.”

Tunis *Agenda* (2005), Paragraph 113

“Appropriate indicators and benchmarking, including community connectivity indicators, should clarify the magnitude of the digital divide, in both its domestic and international dimensions, and keep it under regular assessment, and track global progress in the use of ICTs to achieve internationally agreed development goals and objectives, including the Millennium Development Goals.”

Source: WSIS Geneva Plan of Action and WSIS Tunis Agenda for the Information Society (see ITU, 2005).

The Tunis Agenda requested the United Nations General Assembly to make an overall review of the implementation of the WSIS in 2015. In 2006, the United Nations General Assembly resolved (60/252) to conduct an overall review of the implementation of the WSIS outcomes in 2015. Consequently, in 2011, the United Nations Chief Executives Board (CEB) tasked the United Nations Group on the Information Society, under ITU leadership, to prepare, on the basis of an open consultation, a *Plan of Action* for the WSIS Overall Review (WSIS+10). In April 2012, during the CEB spring session, the plan was approved (ITU, 2013).

As a response to the request made by the WSIS to produce official statistics to monitor the information society, in 2004, the Partnership on Measuring ICT for Development was established at the UNCTAD XI in Brazil, as a multistakeholder initiative for the coordination of activities carried out by international and regional organizations involved in ICT measurement. Its current members are: International Telecommunication Union (ITU), Organisation for Economic Co-operation and Development (OECD), Statistical Office of the European Communities (Eurostat), United Nations Conference on Trade and Development (UNCTAD), United Nations Department of Economic and Social Affairs (UNDESA), United Nations Economic Commission for Africa (UNECA), United Nations Economic Commission for Latin America and the Caribbean (UNECLAC), United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), United Nations Economic and Social Commission for Western Asia (UNESCWA), UNESCO Institute for Statistics (UIS), United Nations Environment Programme/Secretariat of the Basel Convention (UNEP/SBC), United Nations University Institute for Sustainability and Peace (UNU-ISP) and the World Bank.

The *Partnership* has successfully defined a core list of ICT indicators to help developing countries produce official ICT statistics. The core list has been updated regularly since its first publication in 2005. It was endorsed by the United Nations Statistical Commission (UNSC) at its 38th session in 2007; two revised and extended core lists were endorsed by the UNSC in 2012 (43rd session) and 2014 (45th session). The core list has served as the basis for the collection of internationally comparable ICT statistics since about 2005. The latest core list of indicators includes 58 indicators and covers the following areas: ICT infrastructure and access; access and use of ICT by households and individuals; use of ICT by businesses; the ICT sector; trade in ICT goods; ICT in education; and e-government.²

Following the publication of the WTDR 2010, the *Partnership* also took the lead role in monitoring the WSIS targets. The WTDR 2010, which was produced in cooperation with several members of the *Partnership*, presented the first comprehensive quantitative assessment of the WSIS targets. The

report highlighted the need for a formal monitoring progress towards measuring the WSIS targets and suggested a set of indicators to guide countries in their monitoring efforts of the WSIS targets.

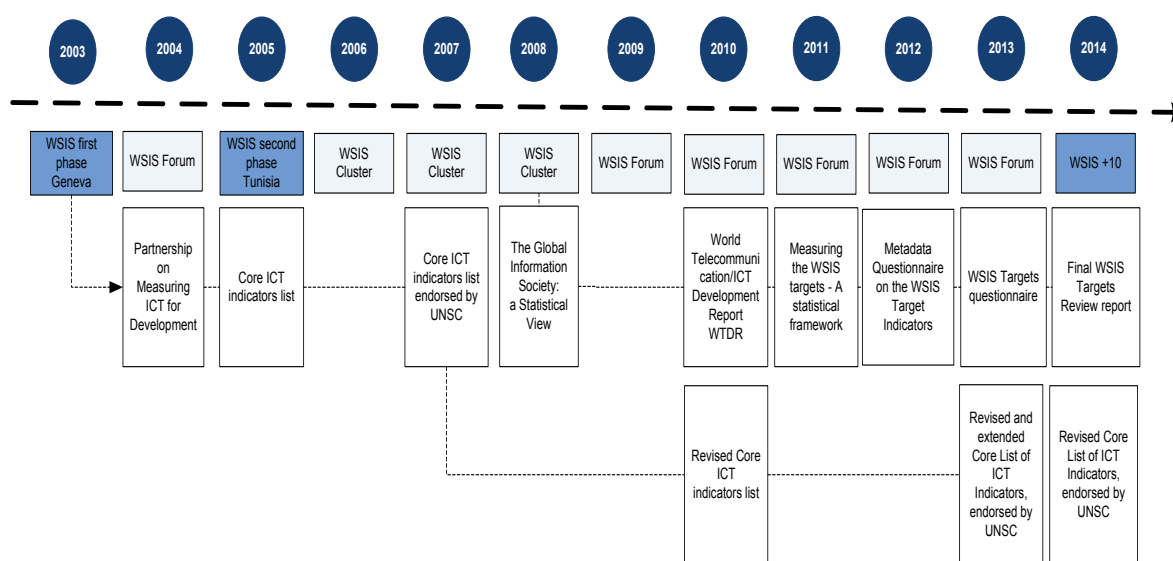
After the launch of the WTDR 2010, the *Partnership* established a Task Group on Measuring the WSIS Targets (TG-WSIS). This group presented its first results at the 8th World Telecommunication/ICT Indicators Meeting (WTIM) in November 2010. In 2011, the *Partnership* published *Measuring the WSIS Targets. A statistical framework*. This framework identified 52³ measurable indicators to help monitor progress towards the WSIS targets. The framework further provided:

- definitions of each target indicator, including the terms used
- derivation of indicators (for example, use of appropriate denominators for proportions)
- classifications to be applied to measure the indicators
- scope of populations of units
- statistical units.

As recommended by the WTDR 2010, and based on the acknowledgment of the importance of businesses in the information society and the digital economy, the 2011 WSIS statistical framework suggested adding a target to measure business connectivity.

The WSIS monitoring process is shown in Figure 0.1.

Figure 0.1: WSIS monitoring process



About the final quantitative assessment report on the WSIS targets

In line with the Millennium Development Goals (MDGs), the year 2015 marks the endpoint for achieving the targets of the WSIS. The *Partnership* has prepared this report – through the Task Group on Measuring the WSIS Targets – with the purpose of elaborating a quantitative assessment of WSIS outcomes within the framework of the *Plan of Action* for the WSIS overall review (WSIS+10). It has been prepared specifically for the WSIS+10 High Level Event, which is “... designed to review the progress made in the implementation of the WSIS outcomes under the mandates of participating agencies, and to take stock of achievements in the last ten years ... The event will review the WSIS

Outcomes (2003 and 2005) related to the WSIS action lines with the view of developing proposals on a new vision beyond 2015, potentially including new targets ...”⁴

It should be noted that the WSIS targets were not framed with measurement in mind and were developed without prior consultation with the statistical community. Therefore, the indicators that the *Partnership* identified in 2011 were developed based on the interpretation of each target and developed to ‘best fit’ their scope and to reflect their essence. This process included inputs and consultation with key international and regional players and experts on topics of the WSIS targets. The list of indicators that was identified to evaluate the WSIS targets was thus developed to capture developments and measure progress over time, and to ensure data quality and international comparability, taking into account international standards.

Several members and non-members of the *Partnership* have collaborated in drafting this report. These are ITU (targets 1, 3, 4, 8, 9 and 10), UIS (targets 2 and 7), WHO (Target 5), UNDESA (Target 6), UNCTAD (proposed Target 11), the Center for Electronic Governance at UNU-IIST (Conclusions and the way forward) and UNECLAC (Introduction). Other contributing authors have been the Universal Postal Union (UPU), the International Federation of Library Associations and Institutions (IFLA), the DEN Foundation and the OECD.

This report reviews progress made since 2003 on the 10+1 WSIS targets. The analysis of the achievements are based on internationally comparable data made available by partners and the non-members listed above, extensive research (including secondary sources), and responses to the *Partnership on Measuring ICT for Development WSIS Targets Questionnaire, 2013*.

The 2013 WSIS targets questionnaire was sent to WSIS focal points in 195 member states, between November and December 2013. It requested quantitative information on each of the indicators. The questionnaire was prepared by the TG-WSIS and distributed by the four UN Regional Commissions (UNECLAC, UNESCWA, UNESCAP and UNECA), OECD, Eurostat and UNCTAD. The global response rate of the survey was 30 per cent, but not all countries that responded to the questionnaire completed it. The level of response draws attention to a lack of availability of official ICT statistics. While there are examples of the efforts made by the international community and countries to advance the implementation of ICT policies and their evaluation, countries have not been able to provide a complete assessment of their progress made towards the WSIS targets, based on the indicators identified by the *Partnership*.

The national coordination of the production and the collection of ICT statistics has also proven to be challenging, given the cross-cutting nature of ICTs. While some of the indicators are collected through national statistical offices (NSOs), usually through household surveys or population censuses, other indicators can be derived from administrative data sources, either by line ministries or other government agencies. A third set of indicators are collected, or derived by specialized (research or analysis) organisations. While at the international level a number of indicators for the WSIS targets (especially for targets 1, 2, 7, 8, 10 and the proposed target 11) are collected by different international agencies, through regular data collections, other indicators are not regularly collected. Data for these kinds of indicators are therefore less available and generally not internationally comparable.

This report is structured along 13 chapters (including this introduction) reviewing each one of the WSIS targets and the way forward post-2015. Each chapter on the WSIS targets includes:

- an introduction to the target
- a discussion on the indicators that were identified to track the targets and data availability
- a discussion on the achievement of the targets, with presentation of available data for the indicators; where possible, information is provided for different countries, regions and levels of development (classifications for the last two are based on the United Nations Statistics Division M49 classifications⁵); for some indicators, time series data are shown, thus highlighting progress made over time
- a set of conclusions and recommendations for each target, highlighting the key findings on the progress made. Recommendations are made on the relevance of the targets, and the availability of the indicators and their ability to track the target. Depending on the target and indicators, more appropriate targets and indicators, in particular in the context of the post-2015 development agenda and possible ICT monitoring framework, are proposed and discussed.

List of references

ITU (International Telecommunication Union) (2005), *World Summit on the Information Society Outcome Documents: Geneva 2003 - Tunis 2005*, <http://www.itu.int/wsis/outcome/booklet.pdf>.

ITU (2010), *World Telecommunication/ICT Development Report 2010: Monitoring the WSIS Targets, A mid-term review*, <http://www.itu.int/en/ITU-D/Statistics/Pages/publications/wtdr2010.aspx>.

ITU (2013), *Report on the WSIS Stocktaking 2013*, http://www.itu.int/dms_pub/itu-s/opb/pol/S-POL-WSIS.REP-2013-E07-PDF-E.pdf.

Partnership on Measuring ICT for Development (2010), *Core ICT Indicators*, <http://www.itu.int/en/ITU-D/Statistics/Pages/coreindicators/default.aspx>.

Partnership on Measuring ICT for Development (2011), *Measuring the WSIS Targets: A statistical framework*, <http://www.itu.int/en/ITU-D/Statistics/Pages/publications/wsistargets2011.aspx>.

Endnotes

¹ The *Partnership* suggested changes in the wording of the WSIS targets (amended WSIS targets), mainly to improve the measurability to make them more feasible, and to add a target on ICTs in businesses. See *Partnership* (2011) for details.

² See <http://www.itu.int/en/ITU-D/Statistics/Pages/coreindicators/default.aspx>.

³ This includes three indicators to track an additional target on ICTs in businesses.

⁴ See <http://www.itu.int/wsis/implementation/2014/forum/>.

⁵ See <http://unstats.un.org/unsd/methods/m49/m49regin.htm>.