COMMISSION ON SCIENCE AND TECHNOLOGY FOR DEVELOPMENT (CSTD)

Twenty-first session
Geneva, 14 to 18 May 2018

Submissions from entities in the United Nations system and elsewhere on their efforts in 2017 to implement the outcome of the WSIS

Submission by

World Food Programme

This submission was prepared as an input to the report of the UN Secretary-General on "Progress made in the implementation of and follow-up to the outcomes of the World Summit on the Information Society at the regional and international levels" (to the 21st session of the CSTD), in response to the request by the Economic and Social Council, in its resolution 2006/46, to the UN Secretary-General to inform the Commission on Science and Technology for Development on the implementation of the outcomes of the WSIS as part of his annual reporting to the Commission.

Annual Report on Implementation Outcomes of the World Summit on the Information Society (WSIS)

Executive Summary

As part of its twentieth session, the Commission on Science and Technology for Development (CSTD) has met in May 2017 to review and assess progress made on the implementation of the World Summit on the Information Society (WSIS) outcomes. Although the World Food Programme (WFP) is not an Action Line Facilitator of the commitments and recommendations made with regards to implementing WSIS outcomes, WFP provides instead the status of implementation of activities towards the WSIS *targets* in support of the 2030 Agenda for Sustainable Development.

Target 1: to connect all villages with ICTs and establish community access points. As part of the "Communication as Aid" pillar in the ETC2020 strategy, the Emergency Telecommunications Cluster (ETC), of which WFP is the global lead agency, works with its partners to provide services for communities such as connectivity, to ensure affected populations have access to information. In 2017, ETC provided connectivity and power charging stations in community hotspots in Dominica following Hurricanes Irma and Maria to provide affected populations with access to information and allow them to communicate with their loved ones. In Domiz camp in Iraq, the ETC is providing internet access at a youth centre and internet café in the camp.

Target 2: to connect all secondary schools and primary schools with ICTs. WFP as global lead agency of the ETC and together with its partners, provides connectivity at hubs in times of emergency. Hubs locations are selected based on consultation with local stakeholders to prioritise where connectivity is needed. In contexts where emergencies are protracted, the ETC works with humanitarian programme initiatives to support resilience building of affected people. An example of this is the provision of internet connectivity by the ETC in Arbat camp in Iraq to enable refugees attending classes at the American University in Suleymaniyah to use ICTs to access online learning content and search for jobs.

Target 5: to connect all health centres and hospitals with ICTs. As part of the ETC shared humanitarian services, WFP together with its partners, provides connectivity at hubs in times of emergency. Hubs locations are selected based on consultation with local stakeholders, including government, to prioritise where connectivity is needed most. In some instances, this includes health centres and hospitals. For example, the ETC provided connectivity to health clinics and Ebola Treatment Units (ETUs) during the Ebola response in West Africa.

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

The ETC with its strong network of partners provides connectivity in areas affected by disaster. This connectivity is extended both to humanitarian responders and affected communities based on the context. The ETC is putting a stronger focus on preparedness under its ETC2020 strategy to support the development of national coordination mechanisms that engage with communication service providers and emphasise the importance of network resilience and business continuity planning. Through improved planning and coordination amongst stakeholders, we help to ensure that more people have access to ICTs to empower themselves.

As part of its cash transfers programme, WFP provides mobile phones, or SIM cards, for mobile money-enabled cash distributions. WFP currently provides food assistance to more than 80 million beneficiaries annually. Approximately 25% of that assistance is already in the form of cash-based transfers, and an increasing share of those transfers are through mobile money. We expect the number of mobile money beneficiaries to keep growing at very rapid rates. Mobile money requires recipients to interact with technology, and by equipping beneficiaries with SIM cards or mobile phones, WFP not only supports financial inclusion but also increases the uptake of ICTs in the poorest parts of the world.

Trends and Obstacles in Implementation

Considering the 2030 Agenda for Sustainable Development, WFP notes the following trends and obstacles in the implementation of its activities in support of the WSIS targets:

Target 1: to connect all villages with ICTs and establish community access points.

Communications is increasingly understood as a basic human need, alongside food, water and shelter. Technology is a key enabler of disaster preparedness and response initiatives. Several factors constrain implementation depending on the context within which ICTs are deployed. Such challenges include, but are not limited to:

- regulatory barriers;
- onerous licensing and importation rules;
- availability of local capacity to deploy and maintain ICTs
- funding constraints;
- and lack of coordination.

With whole populations requiring access to reliable communication networks, scalability of services remains a challenge for humanitarian organisations. Private sector partners are essential to extend access across entire communities. For local service providers, regulatory barriers, instability of power supply, unavailability of replacement stock, and access hinder the restoration of networks. In addition, in some conflict areas where reliable connectivity is most needed access to communication services can be blocked to limit communication between groups.

Target 2: to connect all secondary schools and primary schools with ICTs; *and* **Target 5: *to connect all health centres and hospitals with ICTs.***

The West Africa Ebola crisis and the response of the humanitarian community highlighted the need for rapid expansion of connectivity to numerous remote locations may become the new normal. A challenge in West Africa was that connectivity services were either non-existent in the areas where healthcare centres were established, or networks were severely overloaded. National service providers were often unwilling to travel to affected areas to extend or enhance network coverage.

The foreseen obstacles to connecting both schools and health centres to technology include:

- Considering that WFP feeds 20 million or more school children every year and that many of the schools are very small, the sheer size of the challenge is enormous.
- Schools and clinics are often remote and difficult to reach, to the extent that even local government can have trouble accessing these
- Lack of reliable power supply and internet connectivity require non-standard solutions, which bear additional costs.

- Lack of IT literacy requires at least basic training for most schools and clinics.

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

The obstacles to equipping beneficiaries with SIM cards or mobile phones include:

- Lack of local legislation to enable mobile financial services.
- Lack of mobile network and mobile money agent coverage.
- Lack of knowledge and experience by mobile network operators of the economics of mobile money operations, which deviate substantially from their normal business model. This often presents an obstacle to reliable and orderly scale-up in situations where mobile money is still new and not widely used, which is in most contexts.
- Beneficiary literacy (IT and otherwise).
- Lack of access to reliable power supply to charge phones.
- In refugee situations, where large populations seek refuge in host countries, additional local regulations can hinder the purchase of SIM cards and mobile connectivity, as is the case with the Rohingya refugee crisis in Bangladesh.

Programmes and projects undertaken, progress, and recommended future actions to be taken by all stakeholders

Target 1: to connect all villages with ICTs and establish community access points. Recent disasters have clearly highlighted the need of providing connectivity to communities during disasters, as it allows them to communicate with their loved ones, request much needed support, access information and have a say in the response and recovery of their own community. In collaboration with its global network of partners, the Emergency Telecommunications Cluster (ETC), of which WFP is the global lead agency, seeks to ensure that all those responding to humanitarian emergencies, including disaster-affected people, have access to vital communications services.

The ETC deployed ICT services including free Internet connectivity in rural areas of the Caribbean in the aftermath of Hurricane Irma. The Internet connectivity was provided in Dominica, where communities could gather, send and receive information, and further leveraging communities access to information to vital services.

[https://www.etcluster.org/video/etc-services-communities-s4c-dominica]

The ETC also provided Services for Communities (S4C) to the Rohingya population in Cox's Bazar, Bangladesh in October and November 2017. These services include mobile and internet connectivity as well as piloting a mobile application – ETC Connect to help humanitarian responders provide access to information for the affected population.

[https://www.etcluster.org/blog/innovative-etc-mobile-app-enable-communication-between-rohingya-refugees-and-humanitarians-cox]

Together with ETC partner, GSMA, the ETC is working with mobile network operators (MNOs) to improve coordination, promote network resilience and share data. In October 2017, the ETC partnered with the GSMA to run a table-top simulation exercise in Fiji with a collection of mobile network operators from Pacific Island countries. A mock cyclone scenario was presented allowing MNOs test their business continuity plans and coordination arrangements with national disaster management. Expanding on this the ETC and GSMA conducted a joint mission to Haiti in November

2017 which involved meeting with local MNOs and government stakeholders to address areas related to disaster preparedness and response. The GSMA is a global industry body that represents mobile network operators. The principles, objectives and aspirational activities of the Humanitarian Connectivity Charter are supported by the ETC, the UN Office for the Coordination of Humanitarian Affairs (OCHA), and the International Federation of the Red Cross and Red Crescent Societies.

There are currently 146 mobile network operator (MNO) signatories of the Humanitarian Connectivity Charter, operating in over 106 countries. Comprised of three principles, focusing on preparedness, scale and collaboration, signatories of the Charter commit to support improved access to communication and information for those affected by crisis to reduce the loss of life and positively contribute to humanitarian response

[https://www.gsma.com/mobilefordevelopment/programmes/disaster-response/humanitarian-connectivity-charter]

In the same way that no two villages or communities are alike, there is no single solution for extending ICT services to disaster-affected populations across the world. The expectation of communications technology, and therefore the connections required after disaster, will be entirely dependent on their existing relationship with these services. It is critical that humanitarian, government and private sector organisations collaborate for rapid restoration and provision of services to disaster-affected communities. Supporting the establishment and strengthening of government-led emergency telecommunication coordination mechanisms is part of the ETC's preparedness strategy. Together, actors must adhere to existing conventions, such as the Tampere Convention, as well as lobby for change to be able to widely connect villages with ICTs and establish community access points.

Target 2: to connect all secondary schools and primary schools with ICTs. As part of school feeding programmes, WFP has planned activities to provide attendance tracking terminals to schools. This activity is in its earliest stages and has not begun yet. WFP intends to adjust its beneficiary and transfer management solution (slated to track all transfers to our beneficiaries all the way to the final beneficiary within the next few years) to support school feeding transfers. This will require equipping all schools with attendance tracking technology.

One of the core components of school feeding programme design tends to be a conditional transfer to the schoolchild's household (take-home ration), which typically is conditional upon a satisfactory attendance rate. Given that many schools don't have convenient and reliable means to record and report attendance, this form of conditionality is frequently not applied. By supplying schools with electronic devices to support attendance tracking, we are supporting the original programme design. We will use Android technology for the attendance tracking, which means the mobile devices we will use can also serve other purposes in the school (e.g. e-learning). We are thus supporting the diffusion of information technology and the internet to underserved areas.

To enable the success of connecting schools to ICTs, the following actions are recommended for all stakeholders:

- The intervention design and choice of solutions must reflect the need to hand them over to local government within the short to medium term. It is important to make sure the solutions are sufficiently context-specific and do not crowd out suitable local solutions.

- The use of technology in schools should be supported by all relevant policies, regulations and guidance. This translates into a need for advocacy at all relevant levels and with all the stakeholders.
- The proper incentives will need to be put in place for schools to make use of the technology once installed.

Target 5: to connect all health centres and hospitals with ICTs. The ETC works closely with government to identify priority locations where connectivity is required in the event of a disaster. Depending on the context, prioritised sites may include health centres and hospitals as in the example of the Ebola crisis in West Africa where the ETC used portable satellite terminals connected remote health centres to the internet. Such connectivity allows health workers to send and receive essential information.

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

The Emergency Telecommunications Cluster in Haiti, rehabilitated four community radio stations in some of the worst-affected and remote areas in Grand-Anse, Sud and Nippes. The ETC installed new equipment and provided basic power and ICT support, equipping communities to receive, create and transmit humanitarian content for broadcast.

[https://www.etcluster.org/news/good-morning-haiti]

Target 10: to ensure that more than half the world's inhabitants have access to ICTs within their reach and make use of them. As part of its cash transfers programme, WFP provides mobile phones, or SIM cards, for mobile money-enabled cash distributions. WFP currently provides food assistance to more than 80 million beneficiaries annually. Approximately 25% of that assistance is already in the form of cash-based transfers, and an increasing share of those transfers are through mobile money. We expect the number of mobile money beneficiaries to keep growing at very rapid rates. Mobile money requires recipients to interact with technology, and by equipping beneficiaries with SIM cards or mobile phones, WFP not only supports financial inclusion but also increases the take-up of ICTs in the poorest parts of the world.

To ensure the world's inhabitants have access to ICTs and make use of mobile phones and sim cards, recommendations for action to be taken by all stakeholders include:

- Support from governments/regulators and international actors to expanding the reach of a competitive mobile telecommunications sector.
- Activities by national regulators to facilitate financial transactions and basic financial inclusion via mobile phones.
- Advocacy and support from international actors to bring about legislation to produce these outcomes.