Building FOUNDATIONS for eHealth

Progress of Member States

Report of the WHO Global Observatory for eHealth

Executive summary
Executive summary

Every day, across the world, people make improvements in health as a direct benefit of information and communication technologies (ICT). eHealth innovations like electronic health records, computer-assisted prescription systems and clinical databases are transforming health today, and hold even greater promise for the future. ICT support clinical care, provide health information to the general public and scientific information to professionals. They provide a platform for publishing, disseminating health alerts and supporting administrative functions.

The World Health Organization’s (WHO) strategy on eHealth focuses on strengthening health systems in countries; fostering public-private partnerships in ICT research and development for health; supporting capacity building for eHealth application in Member States; and the development and use of norms and standards. Success in these areas is predicated on a fifth strategic direction: investigating, documenting and analysing the impact of eHealth and promoting better understanding by disseminating information.

To that end, WHO undertook a global survey on eHealth with which to garner baseline data on the current state of eHealth. Executed between mid-2005 and mid-2006, it represents the first attempt to examine eHealth from a regional as well as global perspective. Developed and implemented by the Global Observatory for eHealth (GOe), the survey focused on processes and outcomes in key eHealth action lines previously identified by the World Summit for the Information Society (WSIS), which are supported by WHO as an overall framework for action.

Given this survey was the first of its kind the Observatory was greatly encouraged by the number of Member States that responded. Over 700 informants from 112 countries provided their expert knowledge (nearly 60% of the 192 WHO Member States, representing approximately 80% of the world’s population).

- Key findings

Strong growth in eHealth since 2000

ICT is steadily being integrated into health systems and services worldwide, with the majority of growth coming after 2000. Many countries are planning even more ambitious advances in the next two years. This indicates that after a slow start in the 1990s there is growing momentum for eHealth uptake by countries which is very likely to continue.

Relationship determined between eHealth and country income groups

A consistent relationship was found between World Bank income groups and the introduction of eHealth actions by countries. Countries in the high- and upper-middle income groups are more advanced in their eHealth development than those in the lower-middle and low-income groups. Developing countries, in particular, will require extra guidance and support from WHO and its partners if they are not to be left behind in this rapidly emerging age of eHealth.

Solid progress made in implementing foundation actions

Member States are making concrete advances in building foundation policies and strategies for eHealth at the national level, with the exception of eHealth governance mechanisms; in this area, countries clearly need further support. In general, however, the development and implementation of eHealth policies is forecast to grow considerably by 2008, particularly in developing countries.

1 [http://www.itu.int/WSIS/](http://www.itu.int/WSIS/)
2 Number of Member States at the time of survey closure by mid-August 2006.
Implementation of enabling actions needs attention

Adoption of most enabling policies or strategies for eHealth is low compared to the foundation actions reviewed. With the support of WHO, increased attention by Member States will need to be paid to such areas as multilingualism, citizen protection, equity, as well as to requirements for standardization and interoperability.

eHealth applications becoming more widespread

The levels of adoption of eHealth applications surveyed were generally very encouraging. The provision of online health information for the general public shows the highest rate of adoption of any action studied. International eJournal services for health professionals and students are also widespread, and eLearning—for the teaching of health sciences to students and professionals—is expected to expand.

- Proposed action

Building foundations for eHealth provides a global view that will be particularly useful for governments, policy-makers and international organizations in identifying eHealth trends, opportunities and emerging challenges. What global trends mask, however, is the huge variation between countries and across regions. Individual countries are the unit of analysis for this survey and are therefore an important reference point. A complete set of eHealth country profiles of all responding WHO Member States can be found in the Annex of this publication or online at http://www.who.int/GOe. Each country profile lists the progress made in eHealth providing a “snapshot” of the actions taken and assessments of their effectiveness.

The survey analysis suggests that countries in the higher-income groups have progressed further in the adoption of actions and provision of services than those in the lower-income groups, in almost all areas studied. This finding is not surprising; it confirms that the “digital divide” includes eHealth. Our common goal should be therefore to lessen this divide with concerted action. Such action should be undertaken within the framework of partnerships, at all levels.

eHealth is a global phenomenon. One of the guiding principles in advancing WHO’s eHealth agenda worldwide is fostering collaboration with international and nongovernmental organizations, the private sector and other key stakeholders. Member States will achieve increased eHealth development through such collaboration, which includes learning from other countries and partners; their successes and failures will provide the necessary lessons needed for countries to move forward and embrace the emerging age of eHealth.

The actions and recommendations that arise from this report are based on the need for collaboration and cooperation, and of the international sharing of experiences, products and best practices in eHealth. General recommendations and actions in the three layers of eHealth development are outlined below.

To strengthen foundation policies and strategies

- WHO urges Member States to draw up long-term strategic plans for the development and implementation of eHealth services. This involves the establishment of eHealth governance bodies that would provide policy and strategy advice and guidance on data security, interoperability, cultural and linguistic issues, infrastructure, funding, monitoring and evaluation.

- The Global Observatory for eHealth will develop a set of tools and guidelines on eHealth policy for adaptation and adoption by Member States.

- WHO will draw up guidelines for the governance of public-private partnerships and Member States are encouraged to adapt them to their particular needs.

- The Global Observatory for eHealth will develop an international directory of eHealth best practices.
To enhance enabling policies and strategies

- WHO is establishing an eHealth legal and ethics committee that will offer practical guidance on issues such as citizen protection and equity in the eHealth domain. Member States are urged to provide equitable, affordable access to eHealth and promote the principles of confidentiality and privacy in the eHealth domain, and to seek advice from the eHealth legal and ethics committee as required.

- The Global Observatory for eHealth will establish a thematic working group to propose strategies on the international production and sharing of digital multilingual public health information among Member States to avoid the duplication of effort. Member States are urged to produce (and/or reproduce) and share public health content.

- WHO will support Member States to promote the development of national standardized health information systems to facilitate the effective exchange of information between countries.

- WHO is drafting guidelines for the training of health professionals and students in the use of ICT for health. Member States are urged to build on their existing achievements and to adopt such parts of the guidelines as are appropriate for their needs.

To promote the growth of eHealth capacity and applications

- WHO is launching an initiative to promote the adoption of quality criteria for eHealth content. Member States are urged to adopt guidelines to enhance the quality and reliability of content.

- Member States are encouraged to evaluate the benefits of creating open archives for health sciences as a cost-effective approach to the production and dissemination of national research literature.

- WHO will draw up a framework for the training of health professionals using eLearning with a focus on in-country training and local language content.

- Given the increasing need for qualified health professionals and the limited human resources available for training students, Member States are urged to integrate eLearning methods into student education where appropriate.

For more information about this product or the Global Observatory for eHealth, please write to: G0esurvey@who.int or go to: http://www.who.int/G0e.

All rights reserved.