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Editorial

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Today, few would argue, and even fewer would be unaware, of the importance and growing impact of computing, networking and communications (CNC) on our everyday living – including wireless or mobile technologies and sensor technologies. Even though this is most evident in the commercial services sectors, it has also become evident in socioeconomic sectors such as health. The term “eHealth” (or sometimes “eHealth support”) is used generically to mean “the uses of CNC support in medical and health care”, and is frequently preferred over what are presently viewed as the limited terms of “health informatics” and “health telematics”.

Throughout the world, in both the industrially developed and developing societies, we witness CNC experiences in hospitals, health centres, physician cabinets, educational institutions and ministries of health and through health care surveys. We see how CNC can be, and is being, used to handle all forms and types of data (numerical, textual, graphical, audio, visual and combinations thereof) and to conduct research to extract knowledge from the massive amount of health data accumulated over the decades. We witness how CNC has become a vital support to deliver medical care to the individual, the family and remote and otherwise under-served communities, to administer, monitor and evaluate one or a chain of hospitals, health centres, laboratories or pharmacies, and to manage local and national health care programmes.

Two core lessons have emerged from the practical experiences with eHealth of several countries. First, as the experiences of Singapore and Turkey have shown, eHealth support must

not be tackled as an “information technology or IT project” but as a means for improving health care services. In other words, eHealth support must be conceived and managed as a means for health and clinical care transformation. Second, and as far as technology is concerned, the “solutions” must not be conceived as once-and-for-all, but must follow a judicious cost-effective approach of adopting and adapting the technologies and related procedures.

The challenge for a country is to have uniform, cost-effective and nationwide utilisation of eHealth throughout its health sector, not merely “pockets” of eHealth applications and excellence. This is achieved by conceiving eHealth support as an integral part of the national health programme and strategy, and by adopting and enforcing national standards for health data, information and procedures, and for the necessary CNC tools.

Most of the countries of the WHO Eastern Mediterranean Region (EMR) have numerous pockets of eHealth and technology applications, and some have areas of real eHealth excellence. That is, most countries have a few hospitals that are heavily supported by eHealth and technology when instead they should be aiming to uniformly equip all their hospitals with the essential eHealth support and thus enable better nationwide and timely analysis of the health care services. In fact, except for Oman, no EMR country has, and thus cultivates, truly nationwide eHealth support, which is quite feasible and necessary. Why, and what are the challenges in that?

In August 2012, the WHO Regional Office for the Eastern Mediterranean invited a group of eHealth experts to review the regional eHealth situation and provide recommendations for the member countries and the Regional Office. The group’s main findings and recommendations included the challenges of health data, telemedicine, mobile health, management of health care, capacity-building, financial resources, lack of infrastructure and governance. The Regional Director sent the report to member countries for information and invited them to propose needed areas for collaboration with the Regional Office to build or enhance their use of eHealth support, including its core infrastructure. Half the member countries responded – all positively – and one requested support in enhancing its core infrastructure.

A key recommendation of the expert group, which I had the honour to chair, is for each country to build its essential infrastructure for eHealth support. In particular, countries should establish a national network dedicated to the health sector (in short, a “HealthNet”) that is well protected, digitally secure and accessible to all its health-related institutions. Such an infrastructure does not require a ministry of health to lay its own network cables and wireless telecom towers, but to have a network laid over existing facilities. This is possible today for all EMR countries because the key elements of such an infrastructure already exist in all the countries. For example, all

countries have existing dedicated network connections (e.g. for banks or airlines) and/or public data networks (e.g. for the Internet) and/or increasing Wi-Fi connections (e.g. for mobile phones) that are broadband and thus efficiently carry audio-visual materials. The uses of such services, as major building blocks for a HealthNet, are possible if technically sound and fair conditions are negotiated with the owners of these facilities. The Regional Office may be able to help in such negotiations.

Recognizing the economic differences between EMR countries, their start-up HealthNets would clearly differ in geographical coverage and performance. What is important, however, is that every member country needs and should have a national HealthNet, and should make that an immediate goal.

WhatsApp Messenger, the globally recognized and used smartphone application, provides services for sending and receiving text, video and audio messages. These are the same regular services that were developed and established over two decades ago and are today global and globally used routine services. Within 5 years, WhatsApp Messenger grew to support 700 million users, averaging 1.6 billion messages per day, within and between 170 countries. So, what are the secrets of WhatsApp’s phenomenal success? The simple answer: apart from its very minimal charges, WhatsApp Messenger “provides the infrastructure” that enables services, without burdening the users/clients with technicalities or costs, by using the very same Internet plan and service used for email and browsing.

The WhatsApp Messenger lesson is quite simple: make the services available and they will be used, widely and effectively.

A start-up HealthNet does not have to be nationwide from the beginning but should be developed to be extensible geographically and functionally. Experience confirms that even when only a part of such a national network is operational and begins to connect some of the existing institutions, this motivates its own gradual nationwide development, users and uses.

In the interests of their national health care services, EMR countries could and should, at a Regional Committee meeting, seriously commit to eHealth and (a) acknowledge and emphasize that eHealth support was developed and is run as a health care transformation, not an IT project; (b) stress the importance of an adopt-and-adapt approach to the technological challenges; and (c) set as a target, over the following two years, that every EMR country will have a national HealthNet open to and supporting all its health-related institutions.

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