DIGITAL HEALTH TRANSFORMATION: A CALL FOR ACTION!

Digital will be key to meeting the challenges of health care provision in the 21st Century. Digital health solutions can dramatically improve the lives of a growing number of people with chronic conditions; an excellent example being diabetes, where new technology diabetic patients log and monitor their blood glucose levels, gauge their carbohydrate and caloric intakes, track their weight and physical activity, share data and communicate with their physicians and the care community.

Carefully integrated with the patient journey and clinician workflow, digital is perhaps the most powerful way in which we can deliver health care system transformation, and at the same time improving clinical and financial outcomes. This digital transformation allows systems to become more efficient and patient-centric, with most of the care and monitoring provided remotely. With adequate control, quality labelling and codes of practice, health and personal data issues can be identified, addressed and data-protected.

However, although they are readily available, we still don't see a broad and systematic adoption of digital technologies in most health care systems. We are facing a number of challenges and need to find the right strategy and action plan to improve stakeholders' engagement, promote implementations in the clinical setting and accelerate the digital transformation of health care.

With this objective in mind Health 2.0, Mobile World Capital Barcelona and TICBioMed co-organized a digital health champions' meeting on 12 May 2016, gathering key European leaders from health authorities, patient organisations, health care providers, insurers, start-ups, pharma and venture capital groups in the context of the Health 2.0 Europe conference in order to identify challenges and propose solutions. This document is the result of the event's discussions: ***"Digital Health Transformation: A Call for Action"***.

The conversation is NOT over! In the coming weeks, we are inviting you to share your thoughts and contribute to this "Call for Action". To follow or actively participate in the conversations, please join the LinkedIn group "Digital Health Transformation: A Call for Action".

DIGITAL HEALTH CHAMPIONS AT Health 2.0 Europe 2016

Below is an attempt to organize and summarize the conclusions of the discussions that took place on 12 May 2016 as part of Health 2.0 Europe's forum for Digital Health Champions on: *"Building a new roadmap for innovation adoption in the clinical setting"*.

The event gathered 35+ European digital health leaders who identified important barriers to innovation adoption, explored interesting initiatives from around the world to overcome these barriers and provided recommendations for the acceleration of large scale implementations in Europe.

Participants were encouraged prior to the meeting to think about three key questions 'from your professional experience, what are the three main barriers to Digital innovation adoption in the clinical setting?'; 'could you identify the enhancers of three success stories' and 'three actions to start tomorrow'.

The objective of this summary is to ignite a conversation and participative call for action.

We have organised the identified barriers and suggested solutions into four broad, inter-connected groups:

- Global Governance
- The Organisation of Health Systems
- Providers' Concerns
- Communication/Advocacy/Networking/Training

GLOBAL GOVERNANCE

THE CLINICAL EVIDENCE SUPPORTING DIGITAL HEALTH SOLUTIONS IS INSUFFICIENT.

The evidence supporting digital health solutions has mainly been provided by start-ups themselves, although some systematic reviews are available in the scientific literature. There is no official agency or department within health authorities in charge of evaluating, certifying, or recommending digital health solutions. The evaluation frameworks that do exist are neither consistent nor comprehensive and don't provide an easy way to compare clinical and financial evidence across solutions.

Support is needed, at the European and/or member state level, to provide a standardised model and consistent framework for the evaluation of digital health solutions covering key indicators such as clinical and financial evidence, patient safety, privacy and data security, compliance with EU and member state regulations, long-term user engagement, adaptability to the clinician workflow, etc… This framework would guide the development of new solutions and provide start-ups with a consistent set of indicators for the production of their evidence.

Example: Coordinated by Mobile World Capital Barcelona, with the support of the European Commission, five European countries are working together to draft an assessment model for digital health with the objective of agreeing a unique framework before the end of 2016. If you are interested, please contact info@mobilehealthglobal.com

CONCERNS ABOUT DATA PRIVACY AND SECURITY ARE STILL IMPORTANT.

A consistent evaluation framework including an indicator on data privacy and security would allow health authorities to gauge the compliance of apps and solutions with their minimum data protection requirements.

A tendency to restrictive regulation prevents clinicians from testing innovative solutions.

A consistent evaluation framework, built in collaboration with health authorities, would also provide the information needed to reassure clinicians that this specific app or solution is ready for testing in the clinical setting.

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HEALTH SYSTEMS

A SILO CULTURE IN HEALTH CARE CAN OBSTRUCT COLLABORATIVE APPROACHES.

Digital health provides communication tools for better coordination among health professionals and between medical specialties, supporting data-driven decision support, knowledge management and workflow integration. However, the silo culture is still very much present in the world of health care and in itself can be a barrier to the adoption of technologies.

FINANCIAL RESOURCES ARE TOO STRETCHED TO IMPLEMENT DIGITAL HEALTH SOLUTIONS.

There is a lack of financial incentives for providers and health professionals to adopt digital health.

This is especially true when the implementation of digital solutions could result in a decreased number of admissions/ readmissions and a loss of revenues. A switch from activity- to outcome- or value-based compensation would create an incentive to adopt digital health solutions.

STRONG LEADERSHIP IS REQUIRED TO STEER HEALTH PROVIDERS THROUGH DIGITAL TRANSFORMATION.

Risk aversion often translates into inertia. Increased information and exchanges between those in charge of digital transformation would reinforce their leadership (training sessions, working groups, conferences and networking opportunities, etc…). A number of health care providers have created the position of Chief Medical Information Officer (CMIO), essentially building bridges between medical and IT teams.

ORGANISATIONS WANT STANDARDIZED SOLUTIONS, INDIVIDUAL USERS AND PATIENTS WANT PERSONALIZED SOLUTIONS.

There is a strong demand and need to personalize health care services and follow more user- or patient-centered design principles. At the same time, the main focus has been on solving problems at the provider level – not at the user (clinician and/or patient) level. Digital health designs should be at the same time patient-centered and in line with providers' workflow.

PROVIDERS' CONCERNS

HEALTH PROFESSIONALS ARE CONCERNED…

…about patient empowerment and misinformation;

Digital health has enabled patient empowerment. And this new level of engagement, profoundly changing the patient-provider relationship, is only going to increase in the future. The risk of patients misunderstanding the increasing amount of health information available online – and not always from trusted sources - is real and may result in their questioning physicians' advice. Health professionals need to better understand who are the new 'Patients 2.0' and learn how to work with them as a team.

…about additional workload;

Health professionals are not only concerned that digital health implementations will result in an increased workload, they also apprehend a change in the nature of the work performed. They went to medical school to treat patients, not to spend their days doing data-entry. Providers' investment in digital transformation needs to be accompanied by organisational transition and redesign programmes.

…about being replaced by technology;

…about patients' requests to access their digital data.

HEALTH PROFESSIONALS HAVE LIMITED FAITH IN DIGITAL HEALTH OUTCOMES.

In addition to a proper evaluation, increasing health professionals' exposure to digital health solutions and providing them with more clinical evidence would help boost their trust. Success stories need to be highlighted.

COMMUNICATION/ADVOCACY/NETWORKING/TRAINING

THERE IS A GENERAL LACK OF INFORMATION AND COMMUNICATION ABOUT DIGITAL HEALTH.

Digital health ecosystems need to promote awareness and exchanges of best practices. Clinician pioneers and digital health early adopters need to share their experiences on a global scale – maybe through online 'Innovation Observatories', where health professionals could check different implementation projects from around the world and their impact.

Example of Innovation Observatory in Catalunya.

TRAINING AND KNOWLEDGE TRANSFER IS INSUFFICIENT.

Compared to pharma and medical device innovations, there is very little digital health training proposed to clinicians. There is now good evidence that the overall digital literacy of the health workforce is not adequate. On all sides there is a call to develop a digitally smart health workforce.

Mobile World Capital Barcelona has launched the ***Digital Health Academy*** targeting and engaging policy makers, clinicians and technologists on a global scale. If you are interested, please contact info@mobilehealthglobal.com

Equally, digital literacy is an essential complement to general health literacy for citizens and patients, for which additional training and support has to be provided at all levels.

THERE IS NOT ENOUGH EARLY INVOLVEMENT OF USERS IN THE DESIGN OF DIGITAL SOLUTIONS.

While many start-ups have been guilty of developing their solutions 'in a bubble', they now realize that users' long term engagement depends on their early involvement in the design process ('users' being both citizen/patients and the healthcare professionals).

However the insight that start-ups are gaining is too little reflected in the positioning of the large industry players and their design practices. The message needs to be communicated to the Companies and to Venture Capitalists also, that in the long-term there will be better results from needs-led rather than product-led development. Here strong evidence is needed, to reinforce the point and to bring about constructive change, with improved adoption because users, both citizens and clinicians, have been engaged sufficiently in technology design and implementation.

Barcelona 27 June 2016