

The Current State of m-Health Projects in Russia and in the World- Review Lecture

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Abstract

mHealth (also written as m-health or mobile health) is a term used for the practice of medical and public health, supported by mobile devices. The term is most commonly used in reference to using mobile communication devices, such as mobile phones and PDAs, for health services and information (Wikipedia, 2011). The most frequently used application of mHealth is monitoring of vital physiological parameters like ECG, Arterial Blood Pressure (BP), Heart Rate (HR), saturation of arterial blood with oxygen – Pulseoximetry, weight, glucose level in the blood from the patients being at their homes. This is important for healthy citizens of any age, because due to the periodic collection of physiological data we can establish the “norm” levels for the main physiological parameters that is crucially important for early diagnostics of illness. MHealth is particularly important for elderly people and patients with chronic diseases, like diabetes, arterial hypertension and congestive heart failure. The usual set of equipment for mHealth includes monitor of the certain physiological parameter that sends data wirelessly to the cellular phone and , then to the server with the Electronic Patient Records program (EPR). Physician who has access to the DataBase with EPRs takes care of patients being monitored. The main problems for wide implementation of mHealth are too many OSs that are used by smart phones, the nessesity to analyse biological signals right on the cellular phone, different protocols and radio systems used for transmission of medical data to the cellular phone (ANT+, BlueTooth, Low Energy BT, ZigBee, 5,3 KHz channel etc.) The Current state of mHealth projects in Russia and in the World will be covered in the review lecture.