Chapter 5
Patient Centered Medicine and Technology Adaptation

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ABSTRACT

Healthcare across the globe varies in capability and complexity. In some parts of the world healthcare is seen as an inalienable right; in other areas it is a privilege. Despite how medical expertise is allocated, there are logical processes that dictate an intervention. To accurately diagnose and treat a condition, many factors are considered. These include information about the patient history, allergies, current medications and surroundings, in other words, data. The more that is known about a patient, the more quickly and efficiently an accurate diagnosis can be rendered as well as an appropriate treatment plan.

In many locations throughout the world, the optimal process is non-existent or has broken down; the United States is no exception as explained from a national, (Sarfaty, 2010) as well as an international perspective by Zwar (2010). The situation has become inefficient because of poorly coordinated, acute-focused, episodic care. The solution lies in the most basic role of the healthcare continuum; primary care. However, to achieve maximum effectiveness and efficiency, adoption of various technologies need to be embraced. While it is referenced by different terms, the concept is often termed patient centered medicine.

INTRODUCTION

The concept of the "patient centeredness" and the patient centered medical home is not new. It is a model of care originating 40 years ago and refers to a migration from episodic care to a longitudinal plan, a continuum of care that involves the patient and a team to not just deal with illness, but to promote wellness.

The objective of this chapter is to illuminate the issues that plague a specific sector of the healthcare system and how technology can begin to cultivate opportunity for significant improvement. While the discussions largely revolve around the issues within the United States, the principles echo across the globe (Sisko, Truffer, Smith, Keehan & Cylus,

2008). Some nations have been using the patient centered model for years and have found success. In an interview with Dr. Paul Grundy, the Global Director of Healthcare Transformation for IBM, (personal communication, December 28, 2009) he discussed how Denmark has made great strides in the new care model as well as Spain, New Zealand and others. The reader should take away from this a broad perspective on the issues that currently face the foundering primary care industry and in particular the proposed technological adoption to support patient centered medicine.

BACKGROUND

In a message to Congress, the President of the United States said "Millions of our citizens do not now have a full measure of opportunity to achieve and to enjoy good health. Millions do not now have protection or security against the economic effects of sickness. And the time has now arrived for action to help them attain that opportunity and to help them get that protection." The President was Harry S. Truman - in 1945.

Indeed, how times have not changed.

The current financial model for healthcare stems from business rules of the 1800s. People get sick. Clinicians fix them. They get paid for the service. It's a business. Healthcare is like any other business, it requires cash. A constant revenue flow means a constant flow of customers (the industry calls them patients). We have what is better-termed a "sickcare" system. Beyond pure altruism, physicians have little incentive to keep patients healthy. Healthier patients, on the other hand, need less episodic care and more longitudinal care such as annual physicals, care treatment or monitoring plans.

Patient centered medicine is often correlated with the application called the Patient Centered Medical Home (PCMH), the terms are nearly interchangeable. This is a model based on enhanced primary care meaning comprehensive,

timely and patient-centered care that embraces preventative tactics and suitable reimbursement where healthcare professionals can practice at the "top of their licenses," a term used to outline a professional's activities to perform services at the fullest extent possible stipulated by the license. This is accomplished using a team that includes not only the physician staff but also family members and social entities. Patient centered medicine is more than a model; it is a healthcare setting that promotes partnerships between those participants to create a team-oriented and supportive environment. In other words, the care spectrum spans various settings. To facilitate this requires more than a change in culture, it requires technology.

ISSUES, CONTROVERSIES, PROBLEMS

While the medical interventions have moved forward, how we document them has not. Saying electronic medical records (EMRs) are sorely needed is an obvious understatement, so are the frustrations. It has been well documented that migration to an EMR, even in small practices, is met with resistance because it presently slows down the process (Robeznieks, 2005). Cataloging a visit with sidebar activities such as prescriptions is traditionally done with a few notes in a manila folder and a prescription pad. On the other hand, using a tablet PC to populate an EMR that boots slowly, is prone to lockups and stalls between applications exacerbates the problems. Now add the front-end costs of hardware, software, training and risks of data security and we have a woeful candidate for replacement of paper and pen.

But what we have to remember are lessons from the past. In the early 1900s, a novel mechanical device to travel from point A to point B was introduced. The automobile, compared to the horse, had constant machinery problems, was noisy, required fuel that was not widely available, and there were no roads smooth enough for them to

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