

Technology and Healthcare: Breaking Down Doctor-Patient Barriers – Guest Post by Howard J. Luks, MD

Mary Pat's Note: I want to share these thoughts about technology and the doctor-patient relationship from Dr. Howard Luks. Dr. Luks is a member of the Mayo Clinic Center for Social Media, a fantastic follow on twitter, and originally posted these on his site, which is a recommended read for anyone interested in healthcare.



Technology conjures images of steel and gadgets. Parts and pieces. Bells and whistles. It's sophisticated. Intriguing. High tech. But it's well... cold and impersonal. Or is it? Many of us have witnessed firsthand the things that distance patients from doctors. Status. Knowledge. Jargon. Peculiar equipment. Rushed visits. Should we add technology to the mix?

A few short years ago, some health experts refuted efforts designed to progress the use of technology in healthcare. They insisted that technology would distance patients from doctors, who would increase their focus on "dissecting" and "diseases" rather than "emotional connection" and the well-being of their patients. Yet, recent reports have focused on the converse: how technology is bridging the doctor-patient gap, rather than widening it.

Convenience

The most obvious benefit to using technology in healthcare is convenience. With progressive electronic medical records, physicians, referral sources and diagnosticians can share data with ease and speed, thus enhancing and expediting patient care. Patients can also view their own test results, refill prescriptions and send and receive messages from key healthcare professionals, in as close to real time as possible. In today's high-speed living, this benefit remains apparent and immeasurable.

Transparency

Google makes finding answers to almost anything possible. While doing solo searches may not glean the most accurate or comprehensive information, most people can grasp the basics when they dedicate time and energy to learning about a condition or a treatment.

Technology also assists patients to research doctors, practices, hospitals and centers in order to determine a good fit. Although not always reliable sources of information for upstanding physicians (there will always be a customer who is dissatisfied and who will be more likely to write negative online reviews), reviews of truly unethical practices will clearly stand out. With such visibility, patients can make informed decisions about their care. Of course, this can backfire. Perpetual "doctor shopping" can become a deterrent to good health. A 2010 study noted that patients who had a consistent relationship with a single physician experienced both better health and better satisfaction with their care than those who didn't. And a recent Consumer Reports survey stated that 76 percent of primary-care physicians surveyed said that establishing a long-term relationship with a doctor is the most important factor for patients to receive better medical care. Yet, online quality searches offer a good

starting point for patients.

With technology, the trend has been to become your own advocate, and patients have grown an interest in understanding their health. With advanced technology, patients themselves can experience their conditions firsthand. This often enhances buy-in and follow-through on physician recommendations. In one study, cardiac patients who had the opportunity to see their heart scans were more likely to follow recommendations to reduce their risk, such as losing weight.

The Changing Role of Physician

The advent of technology in healthcare in recent years has extended beyond the one-way measures designed for patient and professional convenience, like electronic charting, e-scripts and looking up test results. Now, patients, themselves, can do their research online, unearth information from consumer-driven TV marketing, and use apps designed to track, treat and prevent ill health. This has shifted the physician role to one of interpreter, advisor and coach. Dr. Robert Rowley, a family practice physician in Hayward recently wrote, "Patients, when they come to the doctor seeking health care, aren't necessarily looking for 'raw data' – they have already looked it up online. Instead, they are looking for meaning." This role shift severs the patriarchal, hierarchical, authoritative relationship that physicians have traditionally had (or were perceived to have had) with their patients. And that's a good thing. While doctors will retain the utmost expert medical understanding due to their training and extensive experience, with a more collaborative approach comes the patient's vested interest in their well-being. This can only serve to improve the health of many.

Personalized Care

When all is said and done, what really matters to any human—physician, patient or otherwise—is that they mean something, and that they are treated with respect and dignity. Treating people like objects in any relationship—employer/employee, husband/wife, or patient/doctor—never works. We get ourselves into trouble any time we view people as objects, as means to an end—patient appointments as a means to pay overhead; a sensitive prognosis discussion or phone call as a deterrent to catching up and leaving on time. Yes, we need limits. But not cold and harsh ones. Technology, especially social media and videography, within the confines of ethics, has broken down barriers to allow doctors to see patients as people (and vice versa, to a limited degree) and to celebrate them as such. It's hard to ignore or forget a post about a new baby, a move, or a family death. While the realities of running an efficient practice can't be ignored, people certainly can't.

Technology, it seems, is a winner. It's here to stay. After all, people across the world connect with Google and Skype, navigation bars and Tweeting. Let's use it to our patients' advantage, in "service of humanity... with conscience and dignity."

Howard Luks, MD (@hjluks), recognized by US News and World Report as one of America's Top Sports Medicine Surgeons, is an Orthopedic Surgeon who practices in both Westchester and Dutchess Counties in New York. As an early adopter of Twitter, Howard Luks MD also runs a blog, a Facebook Page, a YouTube channel and a personal site to educate, interact and engage his patients. Thanks to his social capital and proven ability to reach a global healthcare audience, Howard Luks MD serves as a Strategic Advisor to many mobile health care start-ups and Venture Capital firms with strong health care related portfolio companies. With improved visibility and

online credibility, Dr. Luks is actively utilized to engage his colleagues to join him in participating in the Health 2.0 movement, content creation, outbound marketing strategies and strategic content management.



Dr. Luks (pronounced “Lucks”) says “my presence online is to support the spread of meaningful, trustworthy, evidence based (when available), actionable information and guidance to patients and consumers from around the world. I feel that physicians have a moral obligation to fill Google’s servers with quality content to drown out the commercialized nonsense that exists online today.”

PM, EMR and Portals: A Primer on Healthcare-specific Software for Ambulatory Care

Note: This article was first published as PM, EMR and Portals: A Primer on Healthcare-specific Software for Ambulatory Care on Technorati.

Few industries are currently changing as much as the US healthcare system. While many perspectives and ideas are shaping the debate on how to change the system to meet current and future demands, most believe that technology can and will have a huge positive impact on the ability of the industry to deliver quality care in a cost-effective way. Network technologies that can support the ubiquitous exchange of health information in a secure, efficient and collaborative environment hold the potential to streamline and modernize the

current system to maximize resources and positive patient outcomes.

The opportunities for improvement have generated a lot of buzz in both the private and public sectors, and incentivizing adoption of Healthcare Information Technology (HIT) through the American Recovery and Reinvestment Act of 2009 (the ARRA or “Stimulus” bill) has led to considerable interest in an industry often known for lagging behind in the adoption of new technologies.

For many, the healthcare-specific technical jargon and operational knowledge of how healthcare works can be as complex as the products themselves. Here then are descriptions of the three types of medical software used by ambulatory care providers.

Practice Management (or PM) Software

Practice Management (or PM) software has been in wide use in the healthcare industry for almost three decades. Its primary use is the collection of patient demographics, patient insurance detail and the healthcare services and related diagnoses provided. This information is formatted to conform to payer requirements and is submitted electronically to request reimbursement for services. PM software also manages the responses from the payers in electronic format and invoices any balance to the patient in the form of printed and mailed statements. PM systems can be all-encompassing in functionality or can be a la carte in modules.

Functions of Practice Management Software

- *Payer billing*
- *Patient billing*

- *Patient scheduling*
- *Patient recall for future appointments or services*
- *Referral management (inward and/or outward)*
- *Visit counting*
- *Patient eligibility and benefits determination*
- *RVU (relative value unit) reports for compensation by productivity*
- *Payer contract management*
- *A/R (accounts receivable) management*
- *Procedure / surgery estimating*

Electronic Medical Records (EMR) and Electronic Health Records (EHR) Software

EMRs require and store some of the same patient information as PM software. Patient demographics, patient insurance information and scheduling are actually found in both types of software. When the two programs are integrated, one database typically serves both sides. While the PM system focuses on relating to the financial side of the practice, the EMR system organizes patient medical data.

Although the terms “Electronic Medical Record” and “Electronic Health Record” are used interchangeably by vendors and providers these days, the strict definition of the two terms provided by the Healthcare Information and Management Systems Society (HIMSS) defines an EHR as an individual record of a specific patient’s care, defining an EMR as the software platform that houses all of the EHRs the practice generates.

EMR systems are newer to and less evident in the outpatient healthcare industry. Tools to secure the system while making

the data accessible, as well as installing hardware in clinical settings like exam rooms, are still fairly recent developments, especially for small to medium-sized private physician groups. As adoption continues, and the Federal government encourages entities to move to EMR, the interoperability of the software means a patient can easily and securely have records sent from one provider, healthcare system, or location to another – reducing mistakes and costs to inform providers and patients making decisions.

Functions of Electronic Medical Record Software

- *Capture and reporting of discrete data*
- *Coding assistance*
- *Clinical visit summary*
- *pdf record repository*
- *Data aggregation in graphical form*
- *Access to patient records from other locations*
- *Medication reconciliation*
- *Patient recall for disease management or medication review*
- *Standards of care protocols / algorithms*
- *E-prescribing*
- *Data collection for interface with research or accreditation registries*

Patient Portals

While PM and EMR systems seek to capture and organize patient data to support the practice's operations and patient care, Patient Portals facilitate communication of sensitive health information between patients and care providers. Most Patient Portals are web-based systems that attach to the provider's website to allow patients to securely send and receive

information.

By allowing more data to be transferred securely in a digital manner, patients can save time and effort communicating with their healthcare provider. Some patient care (eVisits or virtual visits) can take place via the Patient Portal, and organizations can save overhead and human resources on phone calls and in-person visits when replaced by secure emails or chats with nurses, insurance clerks, medical records clerks or lab technologists.

Functions of Patient Portals

- *Online completion of patient paperwork – demographics, insurance information, medical history, Notice of Privacy Practices (NPP) and other signatures necessary to receive care*
- *Online bill pay*
- *Medication/refill requests*
- *Appointment requests*
- *E-commerce – secure purchase of health products*
- *Secure email between physician and patients*
- *Online chat with staff*
- *Virtual Office Visits (reimbursed by some payers)*
- *Laboratory Results Communication*
- *Self-scheduling appointments*
- *Patient billing via secure email*
- *Online referrals (inward/outward)*
- *Exchange of patient records between physicians/providers sharing a patient's care*
- *Personal Health Record (PHR)*
- *Kiosk for patient check-in*
- *Patient submission of vital signs and other health data*

Putting it all together

All three types of software are designed to make information work for patients and providers without bogging down the delivery process with paper. By harnessing advances in network security, performance and usability, PMs, EMRs, and Patient Portals have the potential to make today's patient experience cost-effective, efficient, pleasant and safe.