

Leading the Way: Cardiology and the Future of HealthTech Innovation

Seema Pursnani, MD, MPH, FACC,¹ Raj Khandwalla, MD,² Rigved Tadwalkar, MD, MS³

¹Kaiser Permanente, San Francisco, CA; ²Cedars Sinai Heart Institute, Beverly Hills, CA; ³Harbor-UCLA Medical Center, Los Angeles, CA

[Rev Cardiovasc Med. 2016;17(1/2):67-68 doi: 10.3909/ricmCAACC1712]

© 2016 MedReviews®, LLC

Technology is transforming the way in which we practice clinical cardiology and conduct research. Indecipherable paper and pen scribbles of patient symptoms have been converted into uniformly interpretable, precisely typed descriptions of events, easily linked to diagnostic testing and other health care provider notes. The electronic health record (EHR) has revolutionized our ability to practice medicine in an efficient, error-minimizing, and evidence-based manner, while also allowing for ease of data extraction and research study. The EHR has also improved the ability of patients to take charge of their own health, through direct review and portability of their health records.

Although the EHR continues to transform care delivery, it is

certainly not the only way. From a record of at-home blood pressure readings, we may receive wearable device data from continuously tracked measurable parameters such as heart rate, physical activity, and sleep patterns. From patient activity logs of symptoms, we may receive single-lead electrocardiogram strips from the AliveCor device (San Francisco, CA) correlating with a patient's symptoms. Instead of going through a simple family history, we may be asked questions regarding a risk profile extracted from a 23andMe (Mountain View, CA) genetic profile report.

Regardless of where we are in our career timelines or trajectories, as cardiologists we must be aware of the innovation that is occurring at lightning speeds around

us. Developing technology that is informative and efficient to delivery of clinical care is of paramount importance. Technology development, validation, and implementation should not occur in parallel to the world of clinical cardiology, but rather be integrated at every stage. California is at the epicenter of relevant technologic advancements. Cardiologists do not simply need to be aware of the existence of Silicon Valley, but rather become leaders and experts with the tools and data that one day will be presented to us directly by our patients.

As a result, we have founded the Technology Committee of the California Chapter of the American College of Cardiology, seeking to catalyze innovation to prevent and treat cardiovascular disease. The committee seeks to bring together

practitioners and technology leaders to develop and implement new solutions in the field of cardiovascular medicine. Specifically,

we aim to foster relationships between physicians and private industry for the research, development, and validation of technologic

tools relevant to cardiovascular disease. We welcome your interest, involvement, and suggestions in this bold new venture.