

COMPASSION IN ACTION WEBINAR EXECUTIVE SUMMARY:
THE ARTIFICIAL INTELLIGENCE REVOLUTION IN HEALTHCARE:
OPPORTUNITY OR THREAT?

INTRODUCTION

Artificial intelligence (AI) is here and evolving quickly. This discussion of the opportunities, promises and challenges of AI was hosted by Schwartz Center Chief Medical Officer Beth Lown, MD, and featured panelists Karl Swanson, MD, co-founder and head of data science at Quench, Michael Lesh, MD, CEO and founder of Quench, Ashwin Nayak, MD, MS, clinical assistant professor of medicine at Stanford University, and Vivek Rudrapatna, MD, PhD, gastroenterologist and assistant professor at University of California, San Francisco. The panel described how AI is being used in healthcare now, and what we can expect in both the near future and long-term.



WHAT IS AI?

AI is an umbrella term for programs that can make machines more humanlike. The majority of healthcare innovation is in the subfield of machine learning. Like traditional software, machine learning runs inputs through a program to get results. Unlike traditional software, machine learning is able to perform complex tasks without explicit instructions. It can learn to constantly improve its results. Large language models, like Chat GPT, is a type of machine learning that predicts the next word in a sequence. AI is not without risks – from inaccurate results to perpetuation of bias to high energy consumption.

WHAT ROLE IS AI ALREADY PLAYING IN HEALTHCARE?

AI applications in healthcare tend to be either clinician- or patient-facing and can serve both clinical and non-clinical needs. Some examples of clinician-facing applications are medical coding, prior authorization, scheduling, diagnostics, and documentation. Some patient-facing applications can include care or benefits navigation, companion AI, and triage/intake. Checklist and protocol-driven tasks may be especially well-suited for AI, including post-discharge or pre-op calls. There are many companies competing in this space.

CAN AI MAKE MEDICINE MORE COMPASSIONATE?

Medicine has become a competitive business focused on efficiency and profit. Clinic visits are short and there is not always enough time for patients to voice their concerns and for clinicians to educate their patients. There is a



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high administrative burden; clinicians spend too much time on paperwork and patients often receive unexpected bills. There are disparities in access to care, from high costs to geographic inequities.

AI offers many opportunities to improve diagnoses and treatment, reduce delays and errors, personalize treatment, optimize patient compliance, and improve patient education. This may also reduce costs and increase access to care. It could help ease administrative burdens and could help capture and measure patient satisfaction. And yet, AI can be trained to sympathize, but it can never empathize as it has no lived experiences.

WHAT ARE THE DRAWBACKS OF AI IN HEALTHCARE?

AI will probably eliminate some jobs, and may not reduce clinical workload and burnout. Unless it is incentivized, doctors' time will simply be reallocated to other revenue-generative activities. The Centers for Medicare & Medicaid Services (CMS) would need to revise its reimbursement policies in order to actually change provider behavior.

In recent years, the leading companies have pushed smaller start-up competitors to the side, which may sideline clinicians' perspectives. It would take government intervention to take steps to accelerate safe AI innovation.

To learn more about AI and hear from our panelists, you can view the full webinar at:
theschwartzcenter.org/programs/compassion-in-action-webinars/compassion-in-action-archive