Introduction to Content Programming and Thought Leadership Committee

The HIMSS Ontario Chapter launched the Content Programming and Thought Leadership Committee in early 2023. Our goal is to share themes, success stories and resources each month to positively transform healthcare in Ontario. The committee selects monthly themes based on industry themes and members' interest and feedback. Content will be shared via the HIMSS Ontario website, LinkedIn and other official marketing channels.

If you are interested in submitting content to the HIMSS Ontario Chapter, please contact us at: **ontario.info@himsschapter.org**.

January Feature: The role of Digital Health to address Health Human Resource Challenges

Executive Summary

In January, we explored the role of digital health in addressing Health Human Resource (HHR) challenges in Canada. We explore five digital health trends that are streamlining care delivery, improving productivity, and reducing burnout amongst health care providers. Read this article to learn how your peers in Canada and globally are using digital health tools to address HHR challenges.

Role of Digital Health to address Health Human Resource Challenges

The healthcare staffing crisis has made headlines globally, as health care institutions buckle under the strain of a global pandemic, lengthy wait-times, surgical backlogs and a burned out workforce. One of the leading causes for the staffing crisis is the overwhelming amount of burnout amongst health care professionals resulting in many reducing their working hours or leaving the profession entirely. Furthermore, with increased patient loads also comes a significant increase in administrative tasks including documentation, data entry, filling of medical forms, etc.

According to research by Doctors Nova Scotia, physicians reported that 38% of their time was spent on unnecessary tasks, 24% was work that could be done by another role, and 14% could be eliminated altogether.

VIRTUAL HEALTH AND REMOTE PATIENT MONITORING (RPM) - Many of us used virtual health during the global pandemic, when family practices and clinics were forced to shut down or limit in-person visits. Patients are continuing to seek out virtual health and are opting in for RPM options to reduce routine visits in the clinic.

Virtual health and RPM also help alleviate the pressure on the healthcare system and reduce burnout for physicians by providing alternative channels for patient care. Virtual health allows providers to not be bound by their geographic limits to care for patients, while RPM allows them to intervene on an as-needed basis, as opposed to frequent routine visits even when there are no substantial changes to a patients' health status.

St. Joseph's Healthcare Hamilton (SJHH) launched SeamlessMD for a broad set of digital health journeys to provide resources and tools including approved education, progress tracking, post-op symptom monitoring to support patients prior to and post-op1. SJHH and SeamlessMD have seen positive outcomes, including 92% of patients recommending SeamlessMD solution, 33% of patients reporting that the platform helped avoid phone calls to the hospital and 85% patients reporting that they feel less worried about self-managing at home[1].
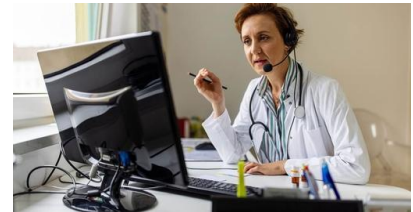

SPEECH RECOGNITION/DICTATION - AI-powered speech recognition software is helping address the clinical documentation burden by enabling providers to dictate notes directly into an EHR. Health systems that have adopted speech recognition software have seen above 80% adoption in the first year and over 160% increase in the documentation captured by providers[2].

ARTIFICIAL INTELLIGENCE (AI) - AI and machine learning models are being increasingly used in health care to address various challenges in the industry.

The Synth.OS platform was featured in CanHealth as an algorithm that is trained to flag abnormal radiology/imaging results. Trained on over one million cases from Saskatchewan Health Authority, the images are read by a radiologist in 24 hours and nurses can receive an AI-generated report within minutes. This can be very meaningful for rural hospitals, clinics and practices that may not have staff radiologists accessible throughout the day[3].

RPA AUTOMATION - Robotic Process Automation (RPA) allows for mundane, repeatable tasks to be automated resulting in increased efficiency and often tangible savings. Automation in health care presents the opportunity to repurpose time for innovation, reduce burnout and focus on quality of patient care.

NewDawn is a pioneer in this field and offers AI-powered digital assistants that help automate various tasks. Below is an example of how RPA can relieve healthcare professionals by automating reports, search tasks and sharing data to EHRs[4].

RPA RELIEVES THE ENT SPECIALIST
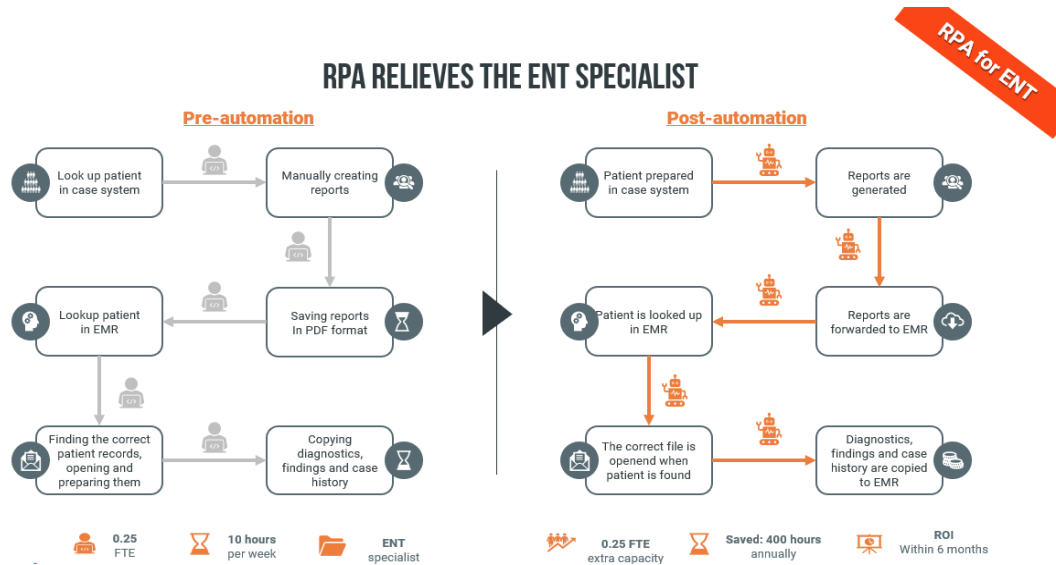
WORKFORCE MANAGEMENT SOLUTIONS (WMS) - WMS are software solutions that help streamline and automate processes that manage staff scheduling, self-service for auctioning/signing up for shifts etc. These solutions can help leaders identify patterns based on historical data to improve staffing complements, staff performance and more to best meet operational needs and have proven to reduce costs and improve efficiencies, while delivering positive patient outcomes[5].

While these digital health solutions are making groundbreaking changes in the healthcare industry, it's important to recognize that the health care staffing crisis must be tackled from various angles including policy, education, training and more to rebuild Canada's healthcare workforce sustainably.

References

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4. *https://www.newdawnrobotics.nl/technology/rpa/*

5. *https://www.forbes.com/advisor/business/what-is-workforce-management/*