

Learning Not to Hate Virtual Visits...

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Setting

- The Center of Education in Primary Care Education (COE) at the Cleveland VA Medical Center is implementing and testing approaches to preparing an interdisciplinary learning group to deliver collaborative, patient-centered care.
- Interdisciplinary learners include:
 - Physicians (PGY 1-3)
 - Nurse Practitioners (Residents and Students)
 - Pharmacy (Residents)
 - Behavioral Medicine (Residents)
 - Social Work (Students)
 - Nursing (Students)

Rationale

- Prior to COVID-19 pandemic, there was some push to utilize virtual modalities, though overall was not a common tool in practice, particularly in Primary Care.
- COVID-19 restrictions required a fast and complete transition to remote visits for providers and trainees
- Determined that very few providers or learners had received any formal training on providing virtual care.

Curriculum Development

- Recognized that virtual medicine requires new clinical skills:
 - Building rapport remotely
 - Tolerating clinical ambiguity
 - Making clinical decisions in the absence of physical exam findings
- Utilized adult learning theory (ICAP model by Chi & Glaser) to develop a curriculum to address these issues and to optimize cognitive engagement
 - Case-based curriculum
 - Utilizes didactics, “unfolding cases” and small and large group work
 - Includes strategies for fostering learner independence and communication skills
 - Leverages digital learning platforms and small group work
- Emphasis on teamwork, leadership, and effective communication

Virtual Medicine Curriculum

Part 1: The Fundamentals (One Hour)

- Focus on the differences between office-based and virtual outpatient medicine.
- Discussion-based with emphasis on patient section, technology, professionalism, etc.
- “Top Ten” anecdotal strategies for developing virtual rapport.

Part 2: Advanced Skills in Virtual Medicine (One Hour)

- Small group work focused on case-based scenarios. Facilitated discussion focused on challenging aspects of virtual clinical practice. There is a emphasis on taking medical histories, attending to non-verbal cues, and assessing for understanding. Also strategies for avoiding diagnostic error and managing clinical uncertainty.

Part 3: Chronic Disease Management and Virtual Medicine (2-3 hours)

- Subsequent sessions focus on managing chronic medical conditions in a virtual setting.
- Facilitated case discussions for an “unfolding case”.
- Learners work as a team to develop a management strategy.
- Facilitators highlight “take home” points.

Virtual Platform

- Tried multiple platforms for learning activities
- Utilized VA teleconferencing system for Parts 1 and 2
- Utilized Zoom for Part 3
 - Learners and facilitators could be on camera for the duration of learning
 - Allowed for transitions between small and large group learning
 - Facilitators can move between sessions/groups easily

Lessons Learned

- Virtual medicine requires a unique set of skills.
- Developing a virtual curriculum requires clear goals, creativity, and dedicated faculty.
- A virtual platform allows for easy access for faculty and fosters group cohesiveness, leadership and autonomy.
- The curriculum has been well- received by learners and can help them understand the most beneficial components of virtual practice.
- Content can be adjusted for different levels of learners/variety of available time frames.

References

1. Knowles MS. Application in continuing education for the health professions: Chapter five of “Andragogy in Action.” *Mobius*.1985;5(2):80-100.
2. Chi MTH, Adams J, Bogusch EB, et al. Translating the ICAP Theory of Cognitive Engagement into practice [published online ahead of print, 2018 Jun 28]. *Cogn Sci*. 2018;10.1111/cogs.12626.
3. Ambrose, SA, et al. *How Learning Works: Seven Research-Based Principles for Smart Teaching*. San Francisco: Jossey Bass; 2010.
4. Reisman AB, Brown KE. Preventing communication errors in telephone medicine. *J Gen Intern Med*. 2005;20(10):959-963.