Al-Based Communications Tool for Medical Practitioners

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Project Overview

- **The Problem**: Doctors need a better way to practice tough conversations and improve communication skills. This prevents burnout and improves patient care.
- Our Solution: An Al-based coach that lets clinicians improve their communication skills by providing instant, helpful feedback on real-world or simulated patient interactions.

Who Benefits:

- Doctors: Gain confidence and reduce stress.
- Patients: Feel heard and better cared for.
- Hospitals: Provide a higher standard of care.

Our Mission

Design an AI-powered communications trainer aimed at delivering timely, objective, and continuous feedback on conversational skills for clinicians, including trainees.

- The system will leverage natural language processing and deep learning technology to assess communication quality, with a focus on enhancing empathetic dialogue, supporting ongoing professional development, and ultimately improving patient-centered outcomes.

Current Market

- The global AI in healthcare market was valued at approximately \$22.4 billion in 2023 and is projected to increase to over \$208 billion by 2030 [1]. This indicates massive investment and rapid adoption of AI solutions across the industry.
- The most significant driver is scalability. Al allows training of multiple users at once helping fix issues of time and financial management.
- We also want to make sure we foster a safe and repeatable learning environment for the people who will use our product.



 Similar products to this idea do exist (Patient Communication Simulators, Bodyswaps, VirtualSpeech) but use an AI simulated environment whereas we want to potentially use this for actual patient interactions

Primary Stakeholders

1. Healthcare Professionals:

 Provides physicians with actionable feedback on their patient communication to enhance empathy improving patient satisfaction and reducing professional burnout.

Medical Trainees:

 Offers medical trainees objective feedback to accelerate their development of effective communication skills and better prepare them for patient care.

Secondary Stakeholders

1. Patients and Families

 For patients and their families, this tool fosters a feeling of being heard and respected, which increases trust, satisfaction, and adherence to care plans.

2. Medical Educators and Training Institutions

 For medical educators and institutions, this tool provides reliable data on learner progress, enabling them to scale empathy training and enhance educational outcomes.

3. Healthcare Administrators and Institutions

 For healthcare administrators, this tool provides key metrics linking communication performance to patient satisfaction and reduced burnout, thereby improving institutional reputation, retention, and compliance with care standards.

Project Needs Statement:

A way for healthcare professionals and trainees to receive immediate, objective, and personalized feedback on their empathetic communication during patient interactions in order to strengthen emotional awareness, enhance patient trust, and reduce provider burnout.

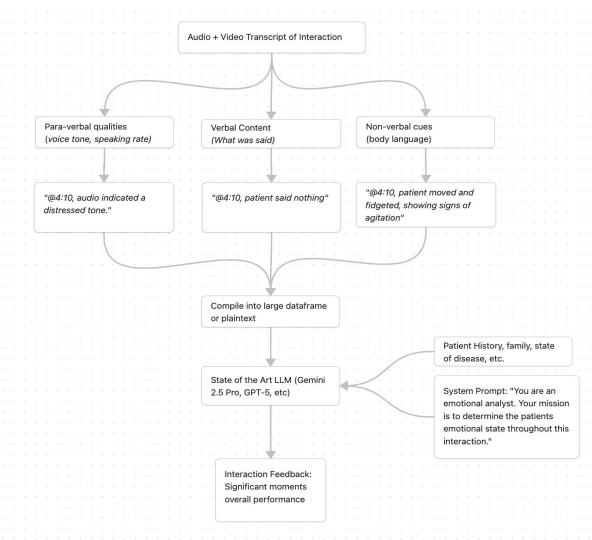
Challenges

- Acquiring data
- Labeling data
- Incorporating the senses
- Training

Future Directions

- Build a prototype
- Generate data with AI

Current workflow →



Thank you!