

ANITA MAX WYNN



MINDSCAPE

AN ALL IN ONE AI MENTAL HEALTH SOLUTION

2024 March 8th



THE MINDSCAPE TEAM



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Jeff Kent
Sponsor

Thank you **Jeff Kent** and the **Gekko Corporation** for sponsoring our project!



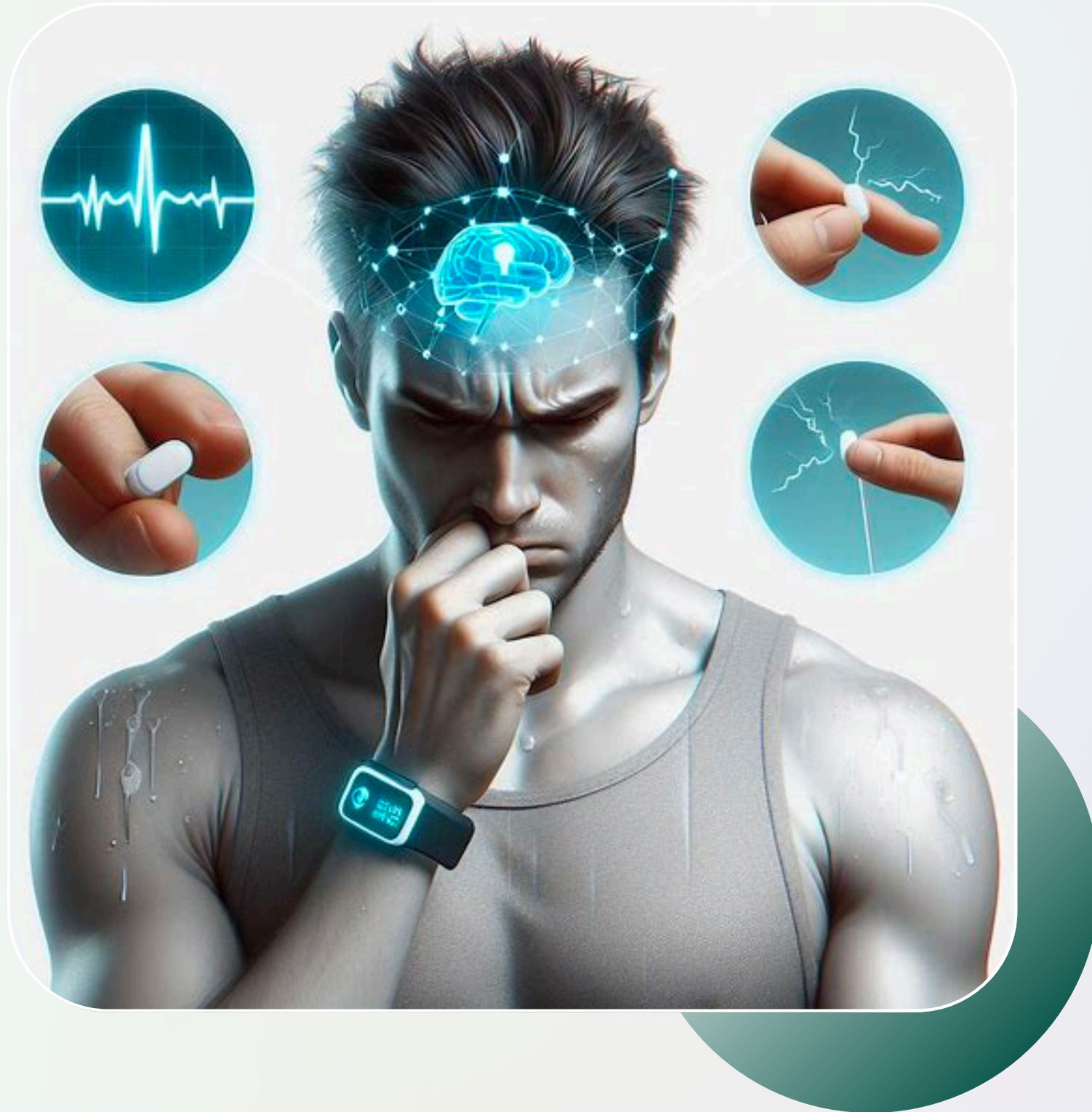
PROBLEM CONTEXT

- **Importance of Preventative Care:**
 - Preventative care is crucial for maintaining overall well-being.
- **Time Gap and Body Changes:**
 - Changes in the body may go undiagnosed until later.
- **Significance of Early Detection:**
 - Preventative care aids in early detection.
 - Early intervention prevents escalation of minor issues.
- **Increased Health Awareness:**
 - Individuals can take steps to manage and improve their health.



Problem Statement

How can the limitations of mental health monitoring, primarily based on subjective self-reporting, be overcome to achieve **more accurate and timely insights into individuals' mental well-being?**



KEY RESEARCH INSIGHTS

- AI can detect anxiety symptoms with **92% accuracy**
- Adaptive conversational chatbots are developing in the market
- Therapists are turning to AI to help with stretched workloads
- Based on interviews, users seem to have very high overall confidence in capabilities of AI
- There can be serious consequences for incorrect machine learning predictions



PERSONAS



Opal LaFort (she/her)



Age: 24

Education: Journalism from Harvard University

Job: Seeking journalism position

Opal finds it difficult to...

navigate advanced health tracking features on her Apple Watch due to limited tech skills.

She wishes to...

discover an intuitive health-tracking solution that aligns with her needs, aiding her in managing potential health concerns effectively.

Tom Green (he/him)



Age: 40

Occupation: Accountant at a large corporation

Family: Divorced with two children

Tom finds it challenging to...

manage stress and incorporate exercise into his routine post-divorce, compounded by his struggle with new technology.

He wishes to...

find a straightforward platform that helps him manage stress, incorporate exercise, and set a healthy example for his family, without feeling overwhelmed by technology.

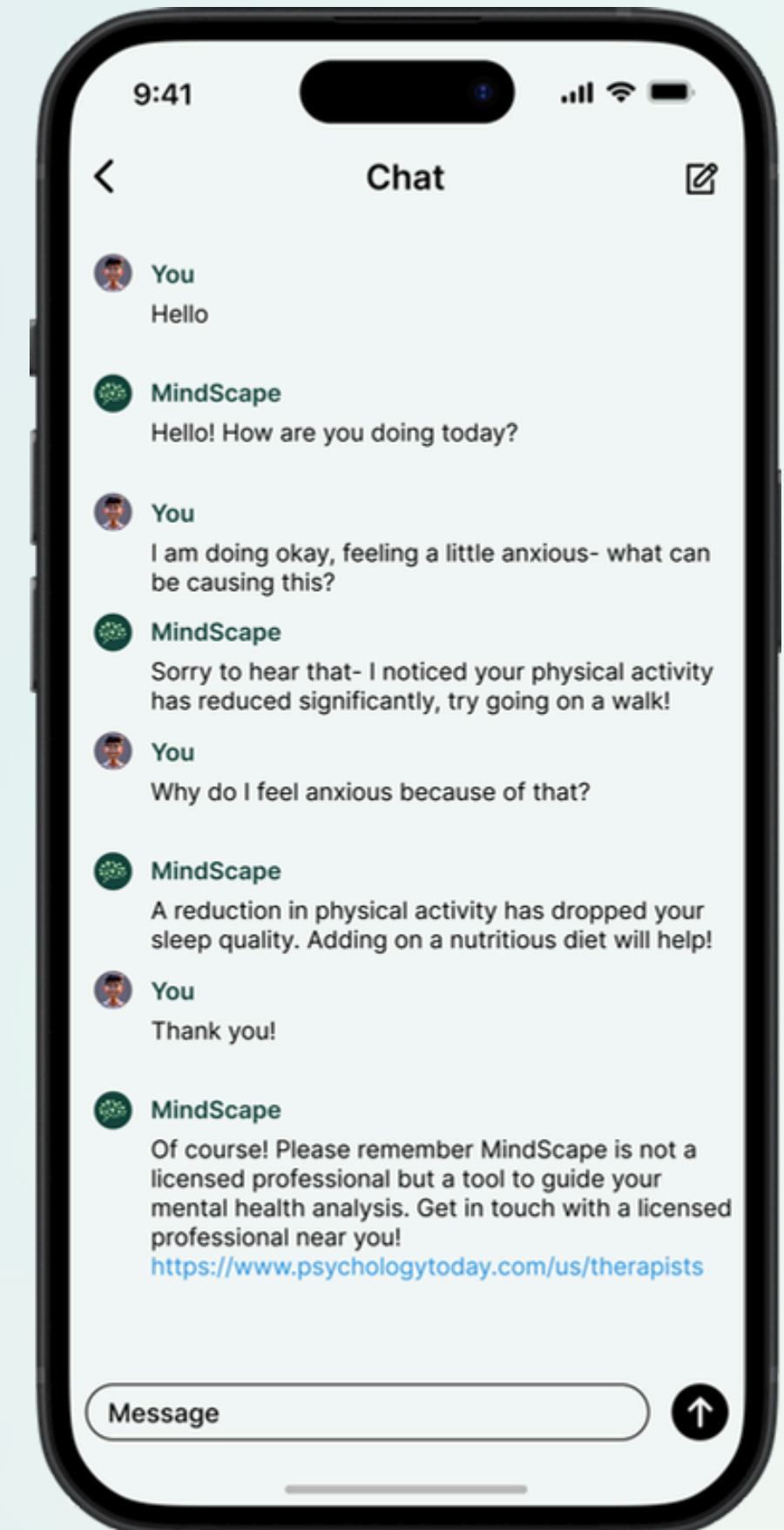
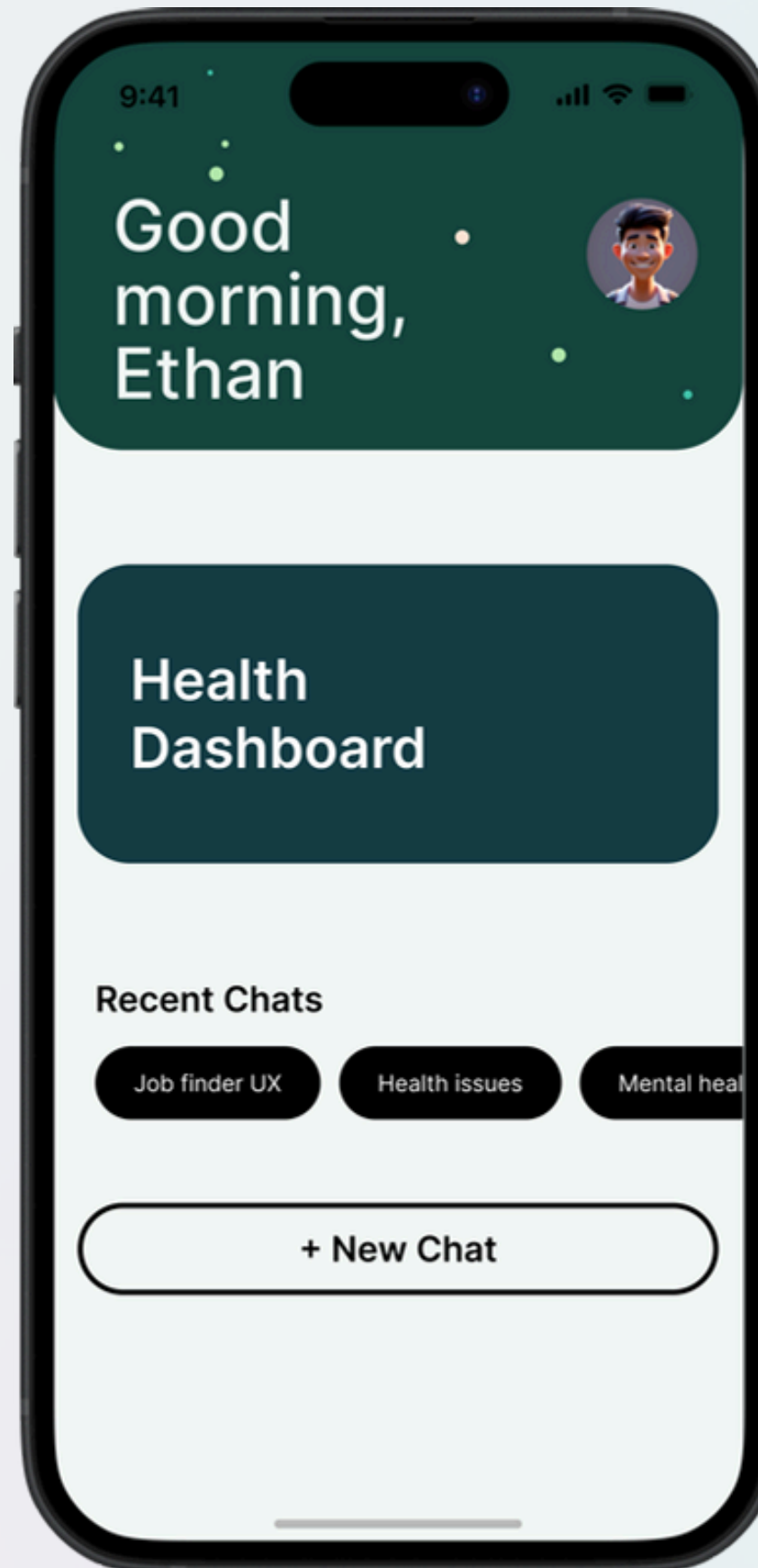
SOLUTION AND KEY FEATURES



MindScape

App/ChatBot

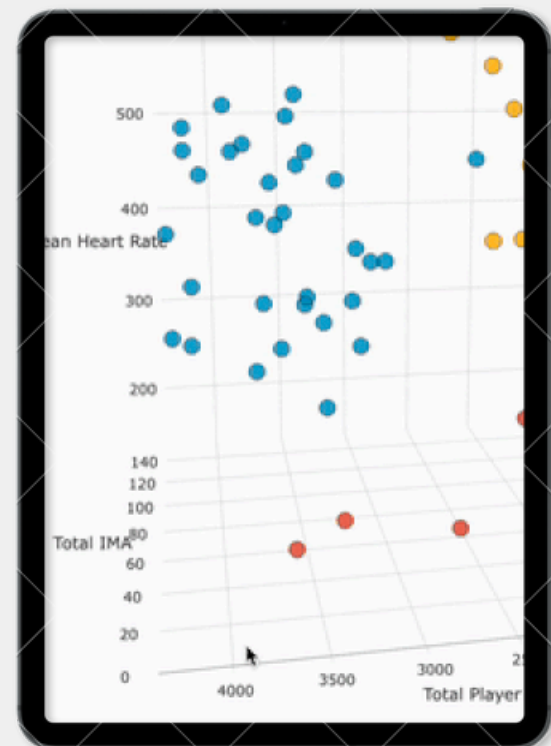
- App connects to the dashboard.
- Chatbot enables data analysis via conversational text using an OpenAI API.



MindScape

Dashboard/ML

Hosted on Splunk



- 01** Data from wearable/IoT health devices collected into a single platform
- 02** Data is diagnosed and categorized.
- 03** Outliers identified by Machine Learning.

User Testing & Validation



- Design is well-perceived by user testing
- A better starting page is needed (**loading page to show that the app is launching**)
- Design direction derived towards simplicity

Concept Validation

Concepts Validated: layout, user flow, readability

Things we learned from testing

- Data usage transparency
- App confusion
- Chatbot accessibility issue
- Appreciate community



Future direction derived from validation

- Communicate how user data is utilized
- Differentiate app
- Implement speech-to-text
- Establish personal goals in your profile and share them with friends



Ethical Considerations

Our values: accessibility and empowerment

Ethical Concerns

- Soly relying on health apps
- Privacy concerns
- Risk of promoting unhealthy habits

How did we address these potential harms?

- Highlight that the app does not replace professional care
- End-to-end encryption
- Ensure evidence-based health recommendations



Next steps beyond capstone

- Automation
- We recommend checking if accessible technology works well with our app such as screen readers, voice control, etc, and adjusting as needed
- Implementing the ability to upload an image for the user profile
- Handing off our project to Gekko Corporation for implementation of additional features, including a chatbot

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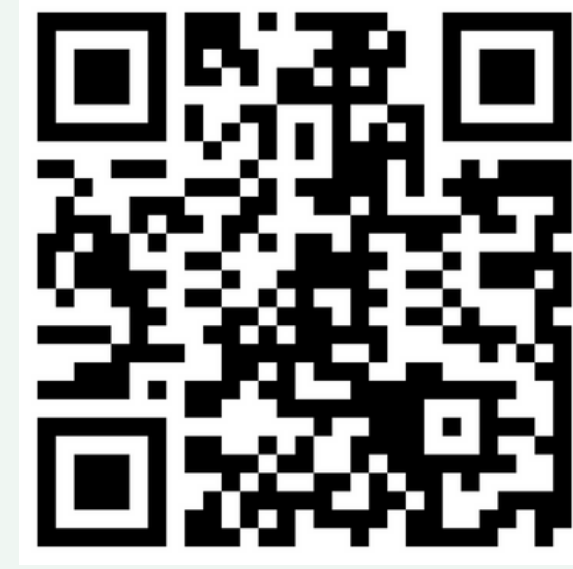
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