

PantherFit**Team Members**

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Faculty Advisor

Dr. Fitzroy Nembhard - fnembhard@fit.edu

Client and Affiliation

Client: Clemente Center gym users

Affiliation: Florida Tech

Progress of Current Milestone 6 (Progress Matrix)

Task	Completion %	Zachary	T'Avion	Melanie	Zion
Porting to Web Version	55%	0%	0%	0%	100%
Test/demo of entire system	85%	33%	33%	33%	0%
Conduct evaluation of components (logging, gamification, etc) and entire system	25%	30%	25%	30%	15%
Create user/developer manual	100%	50%	50%	0%	10%
Create demo video	50%	20%	0%	80%	0%

Discussion of Each Accomplished Task (Milestone Progress)

Task 1: Porting of App to Web Application

Zion has completed the majority of the work involved in porting PantherFIT from React Native to a web application. This transition was prompted by continued technical issues between React Native and AWS integration. The web version currently supports the foundational architecture and allows more seamless AWS communication, positioning the team for a smoother demo experience at the Senior Design Showcase.

Task 2: Test and Demo of Entire System

We have conducted demos showcasing various features of PantherFIT. These demonstrations were primarily executed by Zachary on his local machine. While the application is not yet a fully integrated system, many individual components, such as the gamified badge system, workout logging, and navigation, are functional and were demonstrated separately. Complete system integration and testing are still in progress, with a few modules pending final touches.

Task 3: System Evaluation

System evaluation has been performed on several individual components of PantherFit. For example, features like the workout tutorials and portions of the workout logging system were evaluated in isolation. However, a comprehensive evaluation of the entire application could not yet be conducted due to the lack of a complete, integrated system version. Final evaluation is planned once all components are connected and deployed.

Task 4: User/Developer Manual

T'Avion has mostly completed the creation of the 'User' aspect of the User/Developer manual. It covers the prerequisites for the web application usage, who it is for, various features of the application and how to navigate them (with images accompanying text for further guidance).

Task 5: Demo Video Creation

Various demo clips showcasing individual features were compiled into a single cohesive demonstration video. Melanie led the effort in organizing, editing, and producing the final video presentation, highlighting the application's capabilities and user interface.

Discussion of Each Team Member's Contribution (Current Milestone)

- **Zachary:**

Zachary has been responsible for developing the Developer portion of the User/Developer manual, which outlines technical setup, infrastructure, and implementation details for future contributors. In addition to this, Zachary locally demoed key features of the application to both the client and faculty advisor, while also overseeing general project coordination, milestone progress, and preparation for presentations.

- **T'Avion:**

T'Avion authored the User-facing section of the User/Developer manual, guiding end users through app usage, onboarding, and feature navigation. He has completed the workout tutorial video feature evaluations and is preparing to test the workout logging functionality. T'Avion also played a significant role in testing individual components and contributing to internal documentation efforts throughout development.

- **Melanie:**

Melanie led the production of the final demo video, compiling individual feature recordings into a cohesive showcase for stakeholders. She also assisted with refining UI visuals to improve usability and ensure design consistency. Her feedback helped shape the navigation flow and enhance the overall presentation of the badge system interface.

- **Zion:**

Zion worked on porting key components of the PantherFIT mobile application to a web-based version using the Next.js framework. This web port was a strategic addition to the project rather than a full replacement of the mobile system. Due to AWS limitations that prevent a single backend from being reassigned across platforms, Zion built a new AWS backend from scratch to support the web version. He also salvaged and adapted legacy code from the mobile build to function within the web architecture and resolved various AWS connectivity and deployment issues along the way.

Lessons learned:

- The importance of evaluating project scope and tools beforehand:

The difficulty with using React Native and other external APIs caused many issues in development. Future projects should emphasize early evaluation of scope, technologies, and infrastructure compatibility.

- The importance of constant meetings

Regular team meetings proved essential in syncing progress, identifying blockers, and adjusting plans. Missed communication often resulted in duplicated work or misunderstandings.

- The importance of creating mini-deadlines

Breaking down milestones into smaller deliverables with their own due dates greatly improved accountability and helped prevent last-minute rushes.

- Don't ignore technical debt

Temporary fixes and workarounds, when left unchecked, snowballed into larger refactoring issues later on. It's crucial to log and revisit technical debt as part of the development workflow.

Meeting with Client and Feedback

- 04/14/2025 - The client reviewed the final product and appreciated the polished navigation, medal system, and visual flow. A minor suggestion was to allow gym-goers to disable gamification elements if desired, in a future version, optionally.

Meeting with Faculty Advisor and Feedback

- Host demo videos using an unlisted YouTube channel instead of AWS buckets, embedding them via a lightweight hosting page.
- Present the mobile version of the app and the web version to show project evolution and breadth.
- Enhance the visual design of the project poster, particularly headings, by improving clarity and adjusting font contrast.
- Complete both the User and Developer portions of the manual and ensure the document includes a cover page and a clear table of contents.
- When selecting colors, reduce the overuse of accent shades. Use lighter variations of the base palette. Use black for navigation bars and test color combinations using PineTools (hex lighten) tools.

- The word “Squat” can have a shadowed, beveled style for the poster to make it stand out as a visual element.

Faculty Advisor Signature:

Signature: _____

Date: _____

Evaluation by Faculty Advisor

Faculty Advisor: detach and return this page to Dr. Chan (HC 209) or email the scores to pkc@cs.fit.edu

Score (0-10) for each member: circle a score (or circle two adjacent scores for .25 or write down a real number between 0 and 10)

Zachary Geelalsingh	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10
T'Avion Rodgers	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10
Zion Taylor	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10
Melanie Heetai	0	1	2	3	4	5	5.5	6	6.5	7	7.5	8	8.5	9	9.5	10

Faculty Advisor Signature: _____

Date: _____