Sprint 3 Retrospective

Links

- Deployed App: https://nxtfolio-fall-24-ff06e002a0ca.herokuapp.com/
- GitHub: https://github.com/omarkhater-school/NXTFolio
- Slack: https://csce606-nxtfoliogroup.slack.com/
- Tracker: https://tree.taiga.io/project/honraoyash-fashionxt-nxtfolio/

Sprint Duration

- Start Date: October 25th, 2024
- End Date: November 8th, 2024

Team Members and Contribution

- Caroline Li (Scrum Master): Conducted daily stand-up meetings. Checked in with developers on user story progress. Communicated with the product owner to ensure user stories remained focused on improving the application. Worked on improving code quality and reducing code smells. Suggested on reducing code smells in the Code Climate report from ~500 to ~200 by selectively excluding certain files. Reviewed the pull request.
- Venkat Pitta (Product Owner):Communicated with the client and scheduled meetings to discuss sprint plans, documenting the meeting minutes. Refactored and restructured files to improve code climate and quality.
- Likhith Majjigapu (Developer): Refactored and restructured files to improve code climate and quality. Made changes to the database schema, updated the UI, and wrote unit tests for the 'Edit Gallery' feature. Assisted in reducing code smells in the Code Climate report from ~500 to ~200 by selectively excluding certain files. Reviewed the pull request.
- Brandon Hill (Developer): Refactored and restructured files to improve code climate and quality. Implemented AI-powered bio generation with full test coverage. Performed extensive debugging and documented new code. Cleaned up legacy code when possible.
- Omar Khater (Developer): Wrote Cucumber tests and RSpec tests for the AI user bio feature. Identified key user information elements to prompt the LLM. Designed a new database schema to improve app development. Refactored the existing database schema and created new models, all with full unit test coverage. This work is published on the 'fresh_new_db_design' branch. Reduced the number of code smells in the Code Climate report from ~500 to ~200 by excluding certain files. Reviewed 2 pull requests and updated the deployment based on the latest implemented user story.

- Yash Honrao (Developer): Refactored and restructured files to improve code climate and quality. Worked on the Instagram integration by resolving technical issues and obstacles with the Instagram Basic Display API. Refactored the Sessions Controller and the frontend. Added Instagram testers to the Meta for Developers account. Performed extensive debugging and documented new code. Cleaned up legacy code when possible.
- Manikanta Gudipudi (Developer): Refactored and restructured files to improve code climate and quality. Worked on the Instagram integration by resolving technical issues and obstacles with the Instagram Basic Display API. Reviewed 2 pull requests.

Member	**Contribution**
Caroline Li	14.29%
Venkat Pitta	14.29%
Likhith Majjigapu	14.29%
Brandon Hill	14.29%
Omar Khater	14.29%
Yash Honrao	14.29%
Manikanta Gudipudi	14.29%

Sprint Goals

Our goal for this sprint was to clean up and reorganize code while completing any unfinished user stories. We refactored parts of the legacy code to improve performance, readability, and maintainability, aiming to reduce code complexity and eliminate code smells. Additionally, we ensured that our testing strategies were robust by revisiting our unit and acceptance tests, increasing overall coverage, and separating functional tests from unit tests. We also addressed any issues related to running the app in the development environment and enhanced our documentation, including the README and installation instructions. We delivered a more organized codebase, some initial AI features, and a fully completed set of previously unfinished user stories, setting a strong foundation for future work.

Sprint Achievements

Complete all unfinished user stories from sprint 2

Feature1: Improve user bio with AI
As the CEO of FashioNXT

So that I can Improve my user portfolio
I want to give user AI suggestions on how to refactor their bio
Scenario: AI improves bio
Given I am logged in
And I am on the edit profile page
When I press the AI Improve button on the user bio
Then I will see a text suggestion
And it will contain a new bio suited to my profile

Feature2: Connect to Instagram
As a user
So I can showcase my other platforms
Want to be able to connect my Instagram account to my profile
Scenario: Connect to Instagram
Given I am on the edit profile page
And I see a button to connect to my Instagram account
When I click on the button
Then I will be redirected to an Instagram authentication page
And I will be able to log in
And I will choose which data to grant the website access to
Then I will be redirected to the edit profile page

Feature3: Edit project information
As a creator
So that I can update my project information
Want to edit and save changes to published projects
Scenario: Edit a project
Given I have a project created
And I am on the show project page
When I click the edit button
And I enter new information
And I press save changes
Then the project data is changed

Backlog Items and Status

Removed/In progress stories

Refactoring plan:

Database Optimization

- Review and improve the existing database design to enhance performance, scalability, and maintainability. This will include evaluating normalization levels, indexing strategies, and query optimization.

Test Optimization

- Refactor unit and acceptance tests to adhere to the DRY (Don't Repeat Yourself) principle, consolidating shared logic to enhance readability and maintainability.

Code Quality Improvement

- Identify and address code smells throughout the codebase, with a focus on simplifying and standardizing code to reduce technical debt and improve maintainability.

Test Segmentation

- Separate functional tests from unit tests to clarify the testing scope and ensure each test type addresses its specific focus. This will enhance test execution and analysis.

Coverage Enhancement

- Increase test coverage by identifying and adding tests for untested or under-tested areas, aiming for comprehensive coverage of critical code paths and reducing potential risk areas.

Development Environment Stability

- Investigate and resolve issues affecting the app's functionality in the development environment, ensuring a stable environment for future development and testing.

Documentation Revision

- Update and enhance the README and installation instructions to ensure clear, comprehensive guidance for setting up, deploying, and testing the application, including any changes from the refactoring process.

The refactoring plan is still in progress due to complications related to the legacy code, and more test cases still need to be written to meet the requirements.