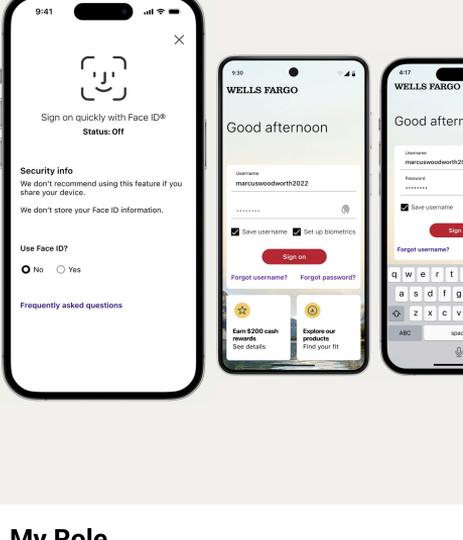




# M1: Biometrics

Wells Fargo's M1 (Mobile First) initiative required an enhanced secure authentication experience for its mobile customers. Within legally regulated conditions, modern biometric options often fall short in addressing customer security and trust.

Mobile App Design (iOS & Android)  
2021 - 2022 (service launched in 2022)  
# of users: 5 million



## My Role



### Title

Senior Product Designer

### Industry

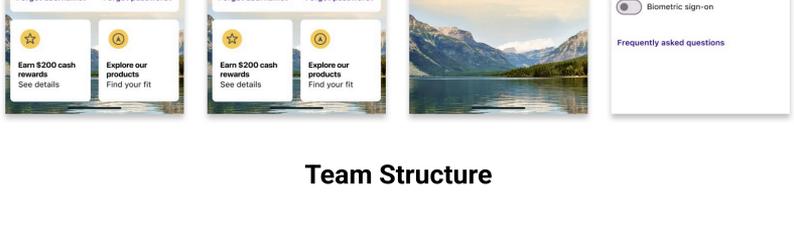
Financial Services

### Platform

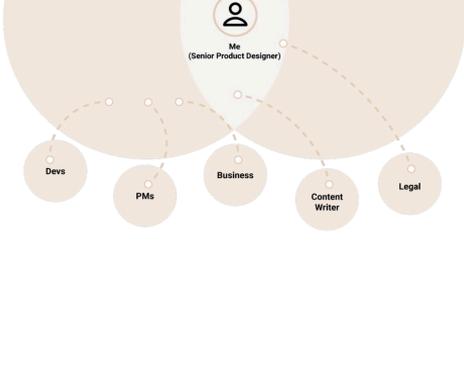
Mobile: Web & Native  
Tablet/Desktop: Web

## My Impact & Outcome

- Brought it to life:** Successfully delivered design to dev. Released in 2022.
- Refined requirements:** Eliminated redundant procedures and defined project requirements.
- User-Centered improvements:** Leveraged existing data and translated to successful designs.
- Spec Lead:** Ensured pixel-perfect workflow across multiple devices for dev spec reference.



## Team Structure



## Problem Statement

Wells Fargo customers require a secure and seamless way to authenticate using biometrics (e.g., fingerprint or facial recognition) on their iOS and Android smartphones. While the current authentication experience supports creating, recovering, and resetting usernames and passwords under legally regulated conditions, it lacks support for modern biometric options that customers increasingly expect as part of their mobile security experience.

## Research

I collaborated with Project Managers, Program Managers, Business, and Marketing. Leveraging PRD and research documents, as well as consulting with subject matter experts, I was able to uncover and solve complex challenges. The information enabled me to bridge technical gaps with business and customer needs, further validating my initial design concepts and iterations.



## User Archetype

Age range: 18-65+ year old



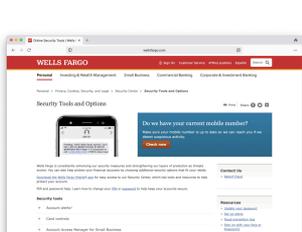
### 40-65+ year old

This age group's primary goal is to manage their accounts: view their account(s) balance, make transfers/deposits, set up retirement planning, and reduce time spent on the banking process. ~30% of these customers are not tech-savvy.



### 18-40+ year old

This age group is savvy. Over 80% of users in this age group are well-versed with mobile app technology. Their primary goal is to open an account (to build/improve their credit) and to start a savings/checking account.



## Problems

### Applicable feature Login

As part of an effort to implement biometrics, users must be informed about new features across multiple product platforms. Therefore, efforts to establish a standard across various verticals had to be aligned and managed.

### Tedious process

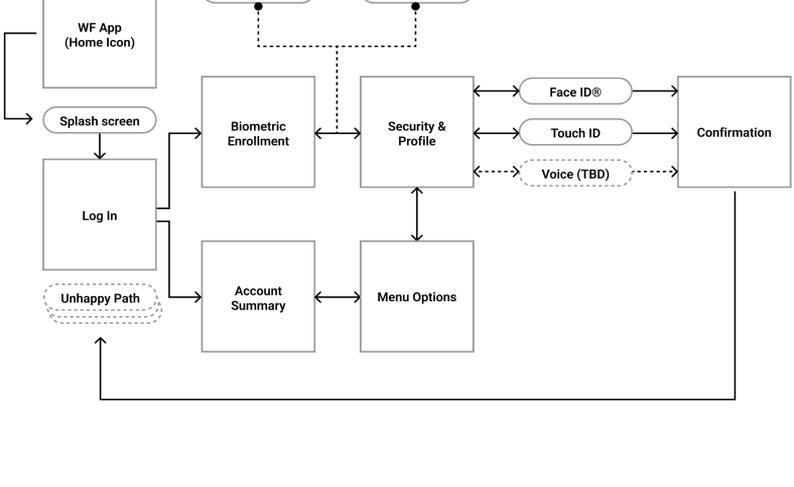
Users have numerous options available. While signing into their accounts. Credential ingress requires a streamlined effort to prevent users from being deterred from logging in to their accounts. Failure to implement correctly can result in a low conversion rate for both new and existing users of other products.

### Information overload

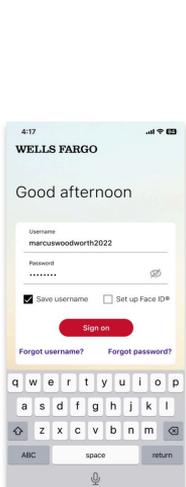
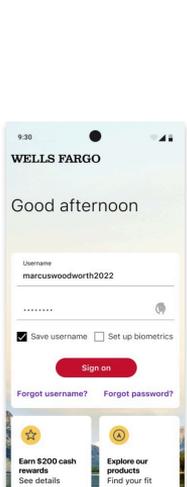
Customers need to be informed about biometric handling to protect their privacy and have access to readily available instructions with complete transparency. This legal information can be content-heavy and may require significant attention.

## Final Solutions

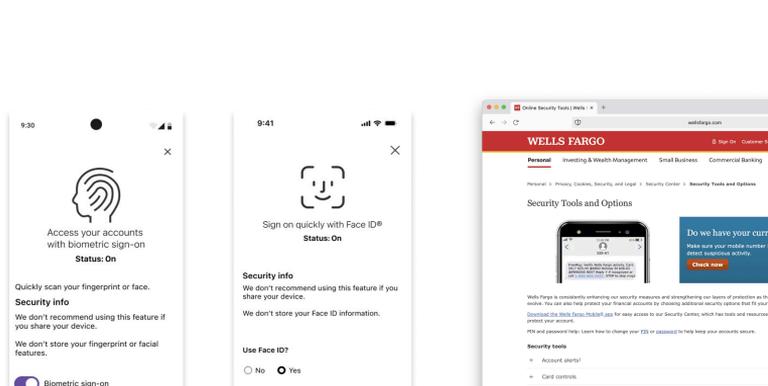
- Establish accessible biometrics in MFP (also known as Login) with the option for customers to activate them. Once the customer has entered valid credentials, take them directly to the biometric screen upon biometric selection on the MFP. This screen is available at all times for the user to activate or deactivate their biometrics.



- Create a alternative experience for Android customers to solve device biometric callout limitations. Users will be able to access biometrics on their Android devices, similar to iOS customers.



- Work with multiple verticals to establish an optimal repository for content-rich biometric instructions that are easily accessible across various platforms, including both native and web apps.



- Create a custom biometric icon concept and include it in the intake request form for refinement by the Visual Design Department. This new visual aid will be the visual icon on Android devices. Furthermore, this icon will replace the initial illustration concept.

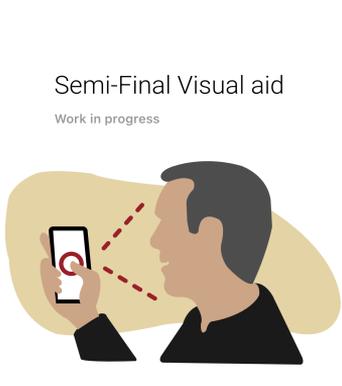
## Research v1

Human and device interaction

Poses and angles

## Semi-Final Visual aid

Work in progress



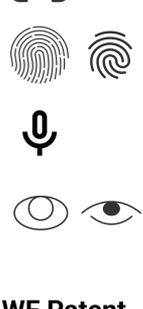
## Research v2

Common biometrics (iOS/Android/other)

Top biometrics

## Final M1 Biometric Icon

Approved



## WF Patent

Wells Fargo, 2022. U.S. Patent, 29/868614

Display screen with graphical user interface for application login, filed.

Legal name of inventor(s):  
Marcus Woodworth