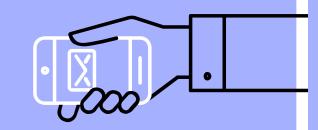
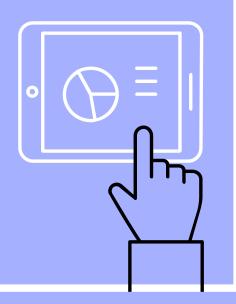


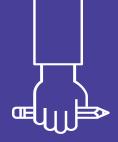


## ALTogether

Danielle, Jung-Won, Haeli, Sydney







Value Prop, Problem and Solution

Tasks

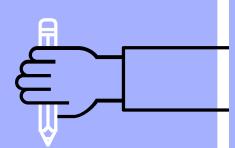
Revised Interface Design

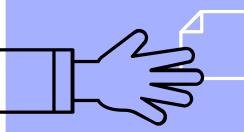
Prototype Overview

Appendix |









## ALTogether

### **Value Proposition**

Creating richer, more reliable alt text

#### **Mission Statement**

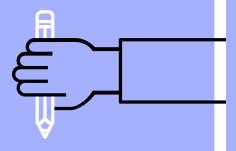
Our goal is to increase overall awareness about accessibility needs for the visually-impaired by guiding individuals to share accessible content on Instagram.



## ALTogether

#### **Problem and Solution Overview**

Blind and visually impaired users often feel frustrated with the lack of focus, context, and emotion in auto-generated alt text on Instagram. ALTogether promotes richer and more reliable alt text by providing sighted users a scaffolded way to personally write quality alt text by modifying Al-generated suggestions on their images before posting. ALTogether not only encourages sighted users to adopt alt text practices, but also motivates followers to do the same through social incentives.





Simple

Sighted users are reminded to write alt text and can find where to write it in the first place



Moderate

Sighted users identify which photos lack alt text and encourage friends to add their own alt texts



Complex

Sighted users modify auto-generated alt text suggestions to add personalized context to their images



## Task 1

Sighted users are reminded to write alt text and can find where to write it in the first place

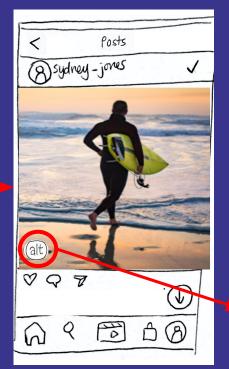












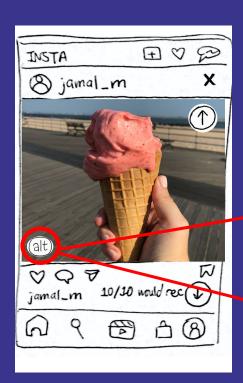


Task 2

Sighted users modify auto-generated alt text suggestions to add personalized context to their images

## Task 3

Sighted users identify which photos lack alt text and encourage friends to add their own personalized alt texts

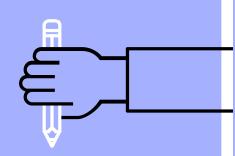




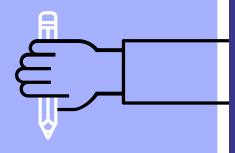










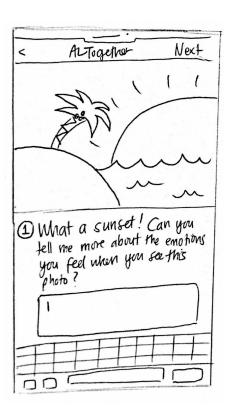


## Major Design Changes

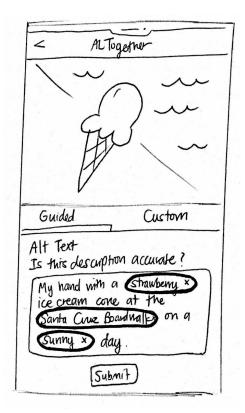


## Change 1: Auto-generate an editable template

**Before** 



**After** 



## Change 1: Auto-generate an editable template

#### **Before**

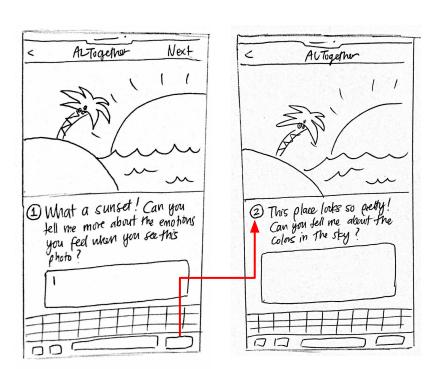
We had empty text boxes where the user could compose their alt text completely from scratch. Following a question-answer model, the user would generate full sentences in response to different prompts, and their individual answers would be consolidated into a complete alt text. However, many users confused these prompts with suggestions for writing regular captions on their images, and they thought examples of well-written alt text were more helpful than complex explanations or tips. Last, many users felt it was too much work to type out full sentences for multiple prompts, as it made them less likely to take the time to write out quality responses.

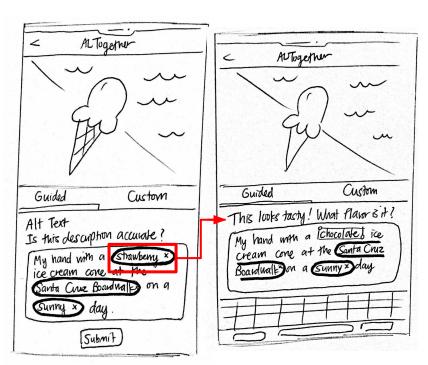
#### After

We revised our guided alt text process to begin by auto-generating a suggested alt text and having the user edit it with more detailed, more accurate context. Suggestions appear in small bubbles where the user can click and write replacements for incomplete or incorrect suggestions. This way, users can still correct and personalize their alt texts without having to start completely from scratch, reducing the amount of time and effort they would need to invest into writing a quality description. Additionally, starting with an auto-generated template gives users a clearer idea of what sorts of details are included in a quality alt text and how long they should typically be.

## Change 2: Consolidate and embed alt text prompts

Before After





## Change 2: Consolidate and embed alt text prompts

#### **Before**

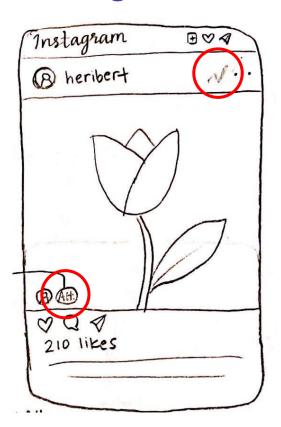
We had multiple pages each containing a different alt text prompt (e.g. "That looks so tasty! Can you tell me what flavor it is?"), and the user would submit their response before moving on to the next prompt. We found that users appreciated these scaffolded prompts, as they liked how it broke down the unfamiliar process of writing alt text into more manageable chunks. However, in all 3 of our interviews, the user clicked through these prompts too quickly, consequently missing a few key details about what the prompt was asking. Many users also found it overwhelming to answer prompt after prompt since it posed too much text to read all at once.

#### After

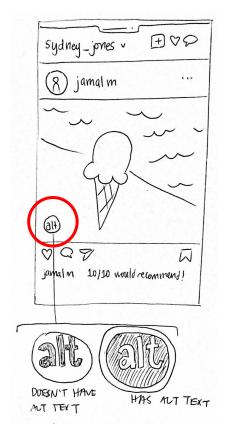
We consolidated the entire alt text writing process into a single screen, so that users must more intentionally interact with the prompts rather than mindlessly click through them. In order to maintain the balance between guiding the user through prompts and not overwhelming them with much text, we kept the structure of scaffolded prompts but decided to embed the prompts within the process of editing. Therefore, users would only encounter "mini-prompts" for the suggestion bubbles that they choose to edit.

## Change 3: Merge alt text indicators into one icon

**Before** 



**After** 



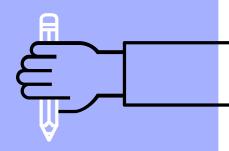
## Change 3: Merge alt text indicators into one icon

#### **Before**

We had two separate alt text identifiers: (1) a small " / X" icon at the top-right corner of each post indicating whether an image has alt text, and (2) an alt text icon at the bottom-left corner where the user could click and see the provided alt text or "nudge" the original poster to write one. We decided to split these icons into two because we wanted a way for users to quickly identify if an image had alt text without having to first click the alt text icon to see it. However, many users were confused about what the "✓/X" meant, as they thought it might mean that the poster was a verified celebrity or that you had liked the image. They didn't realize how it related to alt text at all.

#### After

We combined these two symbols into a single alt text icon. Because users had found the " $\checkmark/\times$ " and the original alt text icon so unrelated, we applied Gestalt principles to group these elements together. Rather than have a completely separate symbol on the opposite side of the post, this new alt text icon merges both functions and uses a colored outline to indicate if the image includes alt text. This way, users can still quickly identify which images are accessible upon first glance. Additionally, the colored outline recalls the familiar action of tapping on "IG stories," suggesting that the user can click on the icon for additional interactions like nudging.



## Medium-Fi Prototype Task Flows

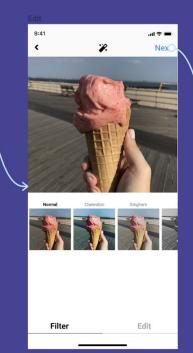


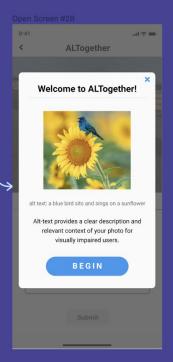
### Simple Task:

Sighted users are reminded to write alt text and can find where to write it in the first place.



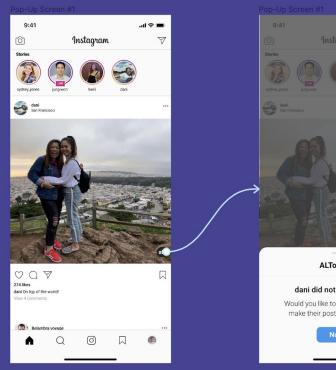


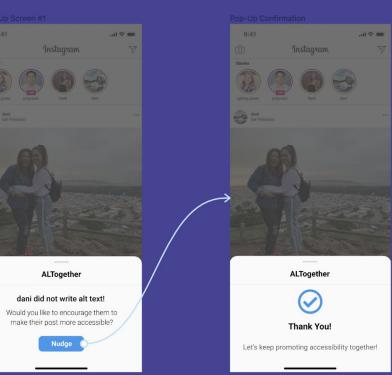




#### **Moderate Task:**

Sighted users identify which photos lack alt text and encourage friends to add their own personalized alt texts.





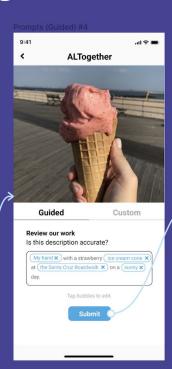
## Complex Task (Guided Path):

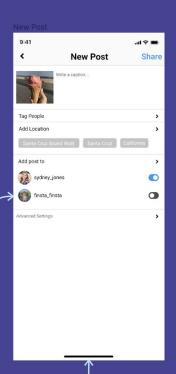
Sighted users modify auto-generated alt text suggestions to add personalized context to their images.



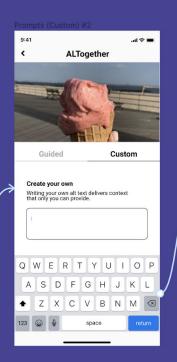


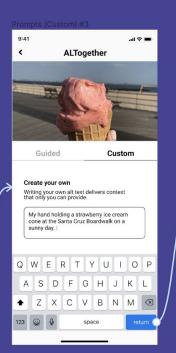




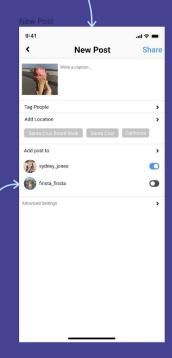






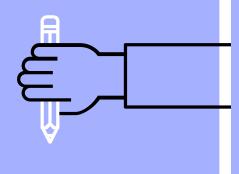






## Complex Task (Custom Path):

Sighted users modify auto-generated alt text suggestions to add personalized context to their images.

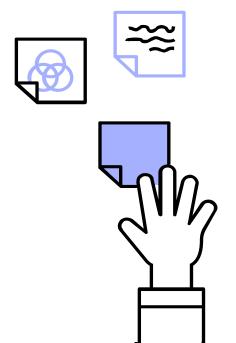


# Prototype Overview



## Design/Prototyping Tools

We used Figma to design our prototype



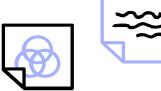
#### Good

- Access to both design and prototype features
  - Add interaction
  - Easy to compile a demo of the product
- Ability to collaborate

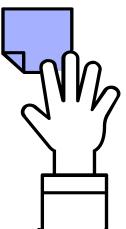
#### **Bad**

- Tedious process of making many variations of the same page
- Hard to keep track of all prototype interactions across screens

## Limitations/Tradeoffs





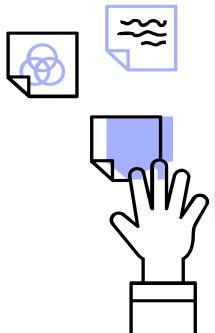


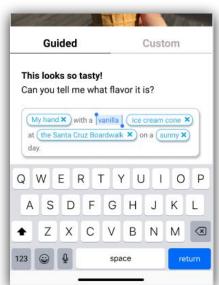
- Our product is intended for Instagram, but we were unable to design paths for every possible interaction on the normal app (e.g. searching the explore page, commenting on post, etc.)
- Since our prototype doesn't allow the user to actually type on a real keyboard, we filled in the input for them (i.e. pre-filling in the "edited" alt text bubbles)
  - No swiping functionality for the introduction to ALTogether section





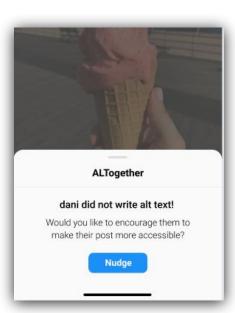
## Wizard of Oz Techniques





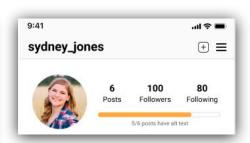
#### **Prompt Generation**

detecting key image features and providing relevant prompts



#### **Nudge Feature**

assume notifications are sent to friend when nudged

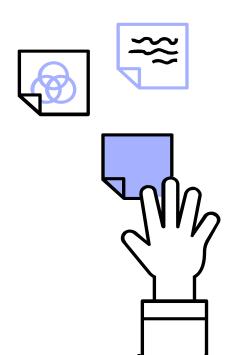




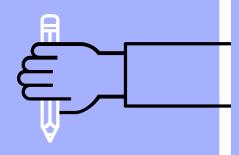
#### **Progress Bar**

having access to Instagram
API to detect how many
images have alt text

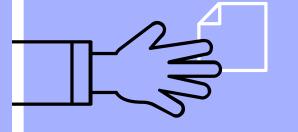
## Hard-Coded Features



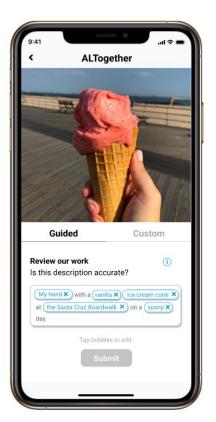
- 1. Feed
  - Main Instagram feed and personal feed accessed through profile
  - Images, comments, fake profiles
- 2. Image uploading and alt text writing
  - Predetermined pathway for posting picture with alt text
  - Which photo from gallery to post; alt text caption; photo filter



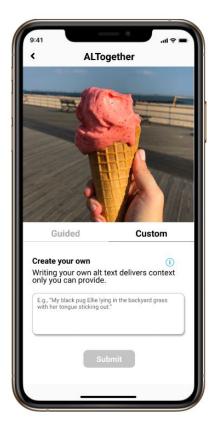
# Appendix



## Additional Prototype Screenshots



VS



**Guided Prompts** 

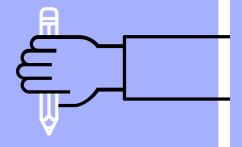
**Custom Prompts** 

## Additional Prototype Screenshots





Checking alt text on your image





## **EXTRA GRAPHICS**















