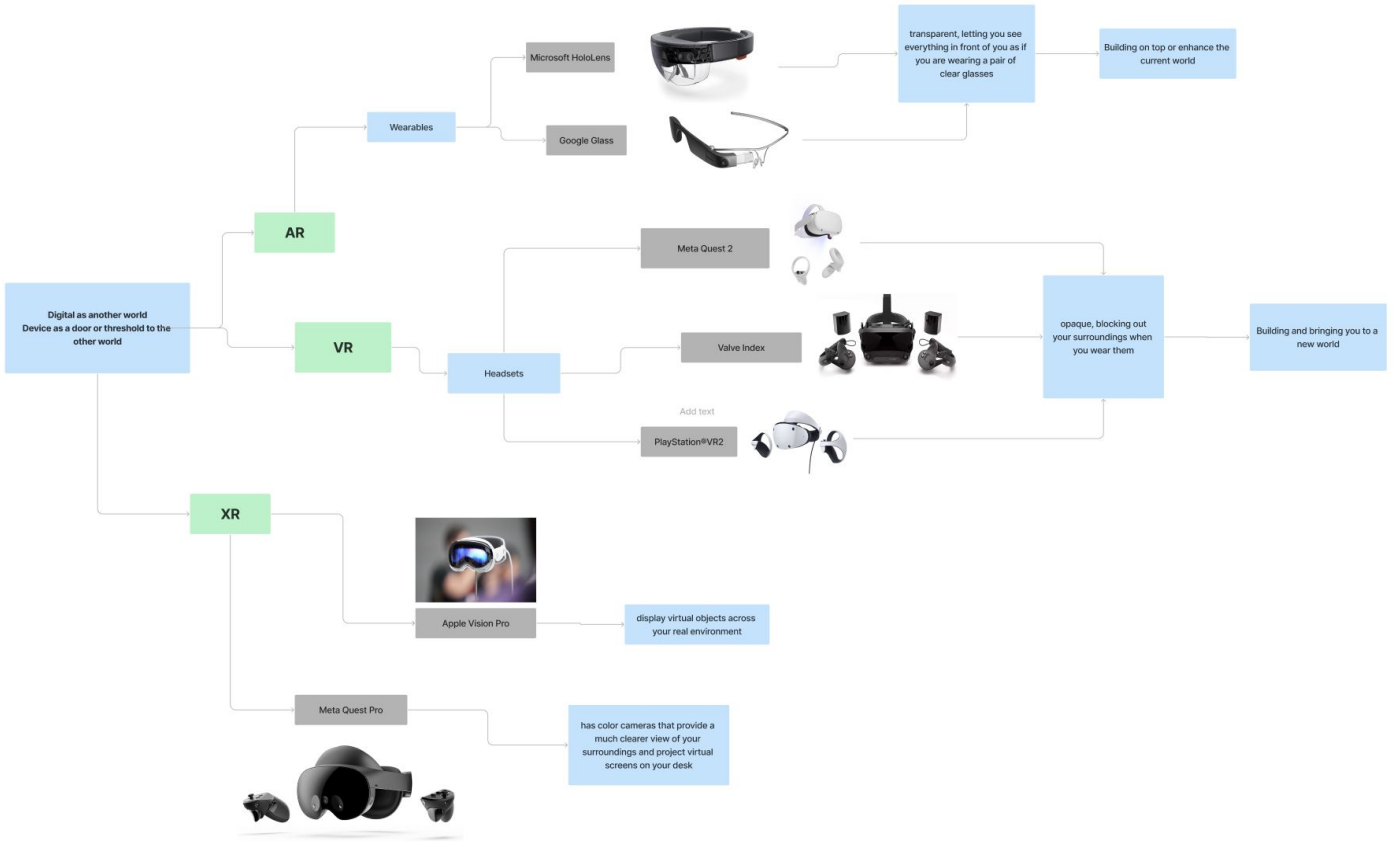
Scout

ORANGE CAT

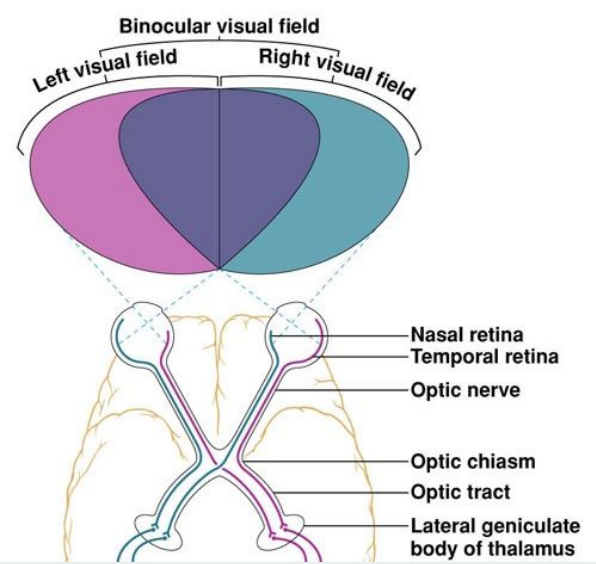
HUGO OH 10043069
HONG ZHENG WU 7251808
YOUNGSUK OH 7253099
SHRAVANI SHINDE 10043038

Existing VR/ XR Devices



Challenge

How we perceive virtual reality



- a stereoscopic display (providing separate images for each eye)
- sensors (accelerometers and gyroscopes)
- Input controllers

Group Manifesto

Close the Gap Between Reality and Virtual Reality

“Goal of good VR design would be the elimination of any functional discrepancies between the functioning of the equipment in virtual and in real modes. Consequently, there need not be any additional cognitive costs to the user of the VR equipment in such a dual kind of perceptual functioning.”

Our Objective

Future Concept of Interacting With Virtual Reality

Thomas Heatherwick - Airo Car

Bjarke Ingels - Virgin Hyperloop

Product Design:
Small hardwares that improves virtual reality experience.

User Experience: Seamless in/out between reality and virtual reality experience

Users

After talking and interviewing to a few technology enthusiast friends and family we identified three types of users for our product.

Aesthetics/ Experience User

Background: Alex is a technology enthusiast and a fan of futuristic aesthetics. They appreciate sleek and modern designs.
Experience Preferences: Enjoys immersive visual experiences and seeks technological innovation in everyday life.
Motivation: Attracted to the wearable's unique design and the promise of a cutting-edge device that seamlessly blends style with advanced technology.

Practical User

Background: Priya is a frequent traveler who values practicality and functionality. They prioritize devices that enhance daily activities and facilitate communication.
Experience Preferences: Values ease of use, practical features, and efficiency in technology.
Motivation: Drawn to the wearable's promise of real-time language translations, navigation assistance, and other practical applications that simplify their daily routine.

Explorer User

Background: Elijah is an adventure seeker and outdoor enthusiast who loves exploring new environments and pushing boundaries.
Experience Preferences: Thrives on novel and immersive experiences, seeks technology that enhances exploration.
Motivation: Intrigued by the potential for the wearable to provide augmented reality overlays during outdoor activities, aiding navigation and offering information about the surroundings.

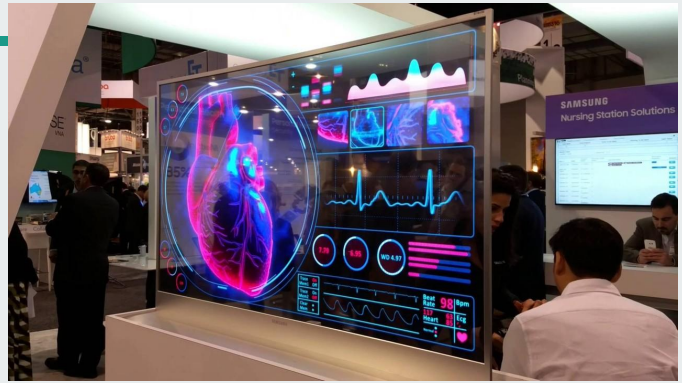
Scenarios

Before (Alex):
Motivation: Alex learns about the wearable through tech forums and social media, attracted by the futuristic design and the promise of advanced features.
Encounter/Usage: Purchases the wearable online, excited to experience its immersive capabilities and aesthetic appeal.
Impact: Finds joy in seamlessly navigating through augmented environments, impressed by the stylish design. Shares positive experiences on social media, contributing to the product's popularity.

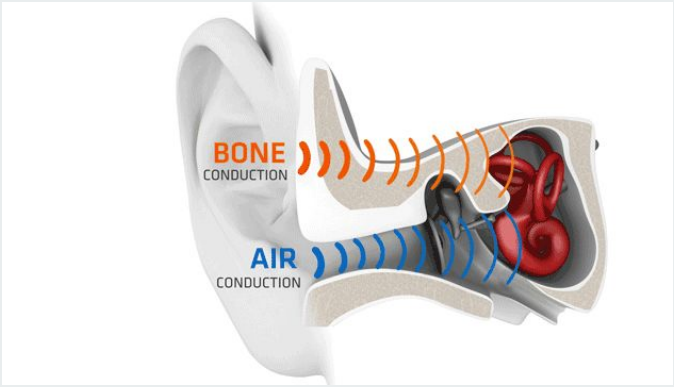
During (Priya):
Motivation: Priya, planning a trip, is intrigued by the real-time translation feature. Acquires the wearable for its practical applications.
Encounter/Usage: Uses the wearable during travels for language translations, navigation, and information retrieval. Appreciates the device's convenience.
Impact: Successfully navigates unfamiliar places, communicates effortlessly in different languages, and finds the trip more enjoyable and stress-free.

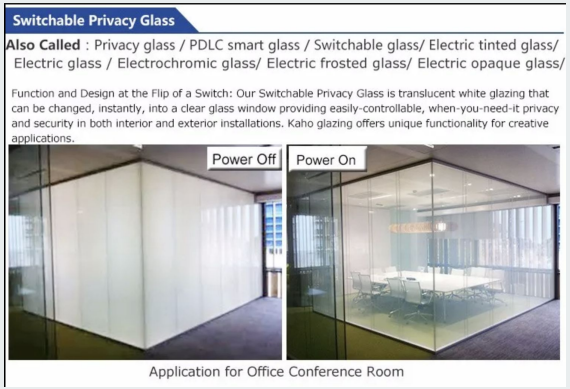
After (Elijah):
Motivation: Elijah, an outdoor enthusiast, discovers the wearable's potential for augmented reality overlays during exploration.
Encounter/Usage: Uses the wearable during hiking and exploration, benefiting from real-time information about the environment.
Impact: Enhances the adventure with informative overlays, feels more connected to surroundings. Shares experiences with fellow explorers, contributing to the wearable's reputation among outdoor enthusiasts.

Technologies to be used



Bone conduction headphones



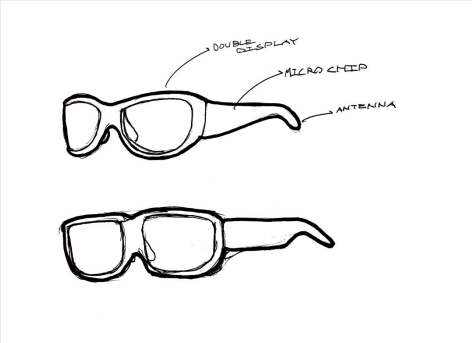


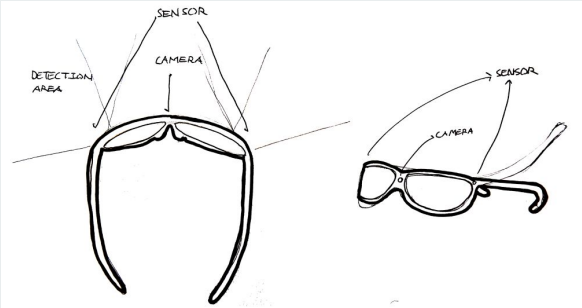
Ray-Ban | Meta Wayfarer

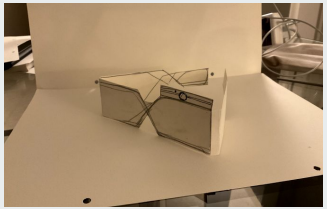
Fashion Trend

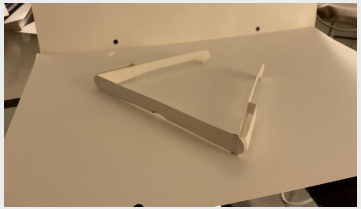
The appearance of glasses becomes more and more avant-garde with the changes in fashion. The narrower frame makes the sunglasses more suitable for the face shape, and some detailed designs give the sunglasses a more sci-fi and futuristic feeling,

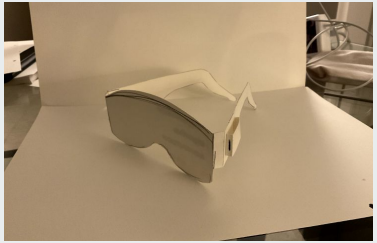
Study Model

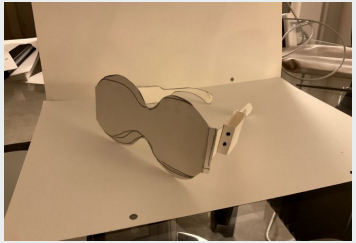

DOUBLE DISPLAY
MICRO CHIP
ANTENNA

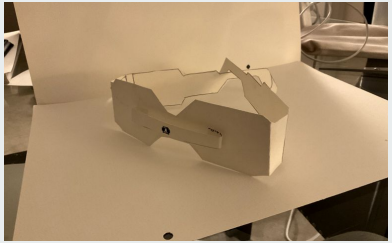

SENSOR
CAMERA
DETECTION AREA
SENSOR
CAMERA

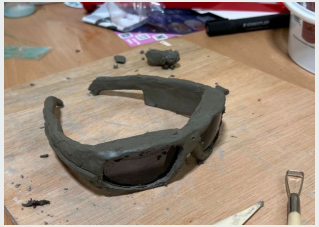




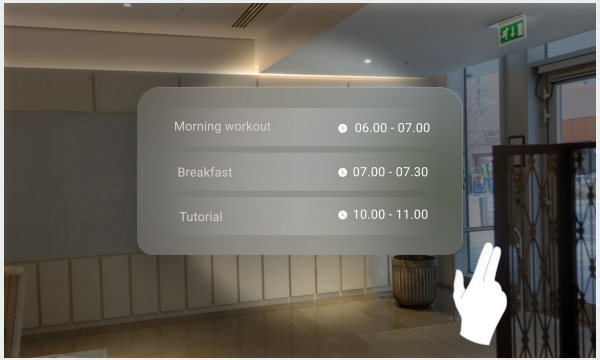


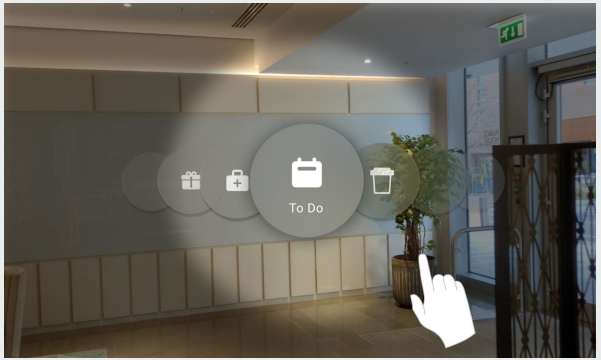






UX Explorations and Features

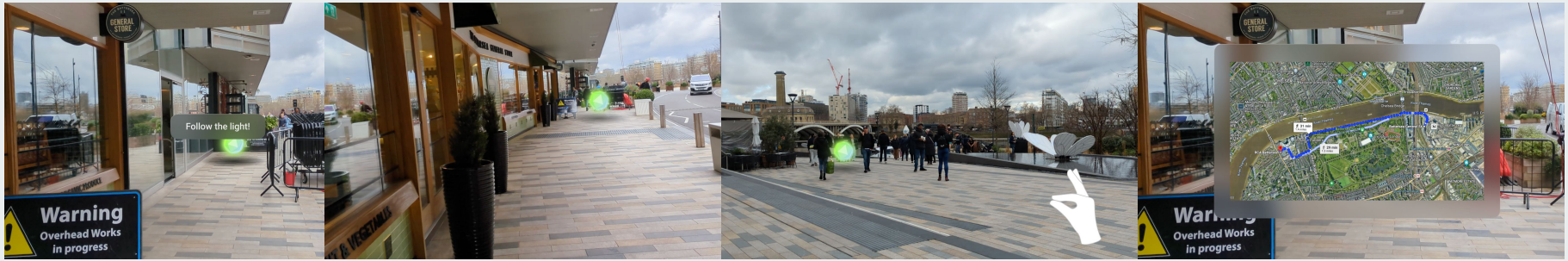




Simple hand gestures

We chose hand gestures that are easy to perform and distinguish from one another. We considered using gestures that mimic real-world actions to make them more intuitive for users.

UX Explorations and Features



Wayfinding

One of our insights from our personas was the users like exploring and adventures, inspired by video game wayfinding we explored speech, environmental ques, visual effects and lighting from our research about wayfinding in vr video games

Other features explored

Real time translation, real time information