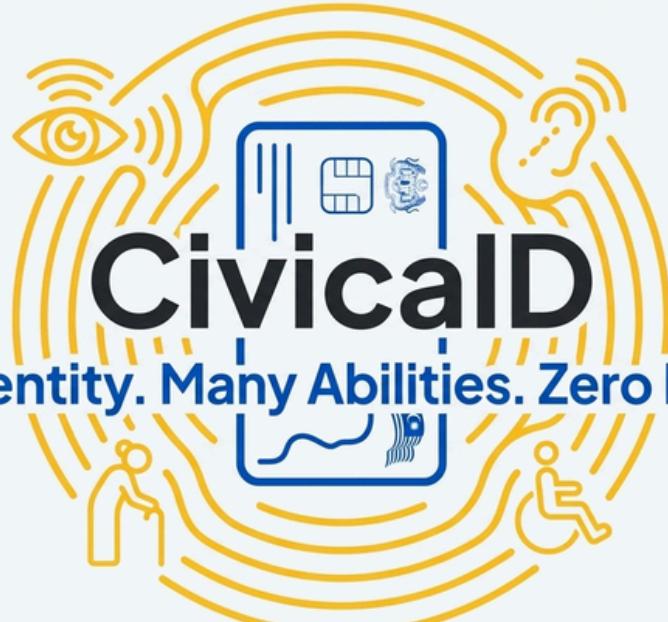


# CIVICALID: SMART IDENTITY FOR AN INCLUSIVE MALAYSIA

Empowering Elderly & OKU Citizens  
Through Adaptive Public Services

Team: Error505 | Inclusivity Track





Our platform transforms the national identity card into the foundational key for personalized, barrier-free access across all public services.

2025

CIVICALID

Error505

# INTRODUCTION

## THE ZERO-BARRIER MANDATE

### The Strategic Imperative: Why We Must Act Now

Malaysia is rapidly progressing toward an aged society. The population aged 60+ reached 11.6%(3.9 million people) in 2024, projected to exceed 17% by 2040(6.4 million people).

This challenge is national as 12 states are already classified as 'aging states', demonstrating widespread need.

We must serve 767,243 registered Persons with Disabilities(OKU) who are currently failed by non-adaptive digital services

We are defining the next generation of public service by replacing the system's 'one-size-fits-all' failure with adaptive intelligence.

This strategic principle is our unwavering commitment:  
*One Identity. Many Abilities. Zero Barriers.*

This project is more than a technology upgrade; it is a fundamental policy commitment to digital empathy, ensuring that no Malaysian is left behind.

# OUR VISION

## THE INCLUSIVE FUTURE: A Single Key to Universal Access

To transform MyKad into a smart, adaptive identity key that unlocks public services instantly, intuitively, and accessibly.



### Seamless Authentication

No forms, no password. The MyKad instantly unlocks service terminals, speeding up transactions for every citizen.

### Automatic Personalization

Triggers real-time UI adaptation(Senior Mode, Voice Guidance), ensuring faster, simpler interactions for every Malaysian.

### Strategic & Equitable Delivery

It makes accessibility mandatory and consistent nationwide, enforcing the principle of Zero Barriers across all public service points.

# ≡ For Millions of Malaysians, 'Digital Progress' Means Being Left Behind



## PROBLEM STATEMENT

The promise of digital services has not reached everyone. The current one-size-fits-all approach, though well-intended, become unintentional **barriers** when the system expects citizens to adapt, rather than adapting to the citizen.

The result is longer queues, reliance on manual help and a widening sense of exclusion —  
**“public services built for everyone, yet still accessible to few.”**

# A Closer Look: Why the Current System Fails

Accessibility today is *static*, but citizens are *dynamic*.

## Visual Barriers

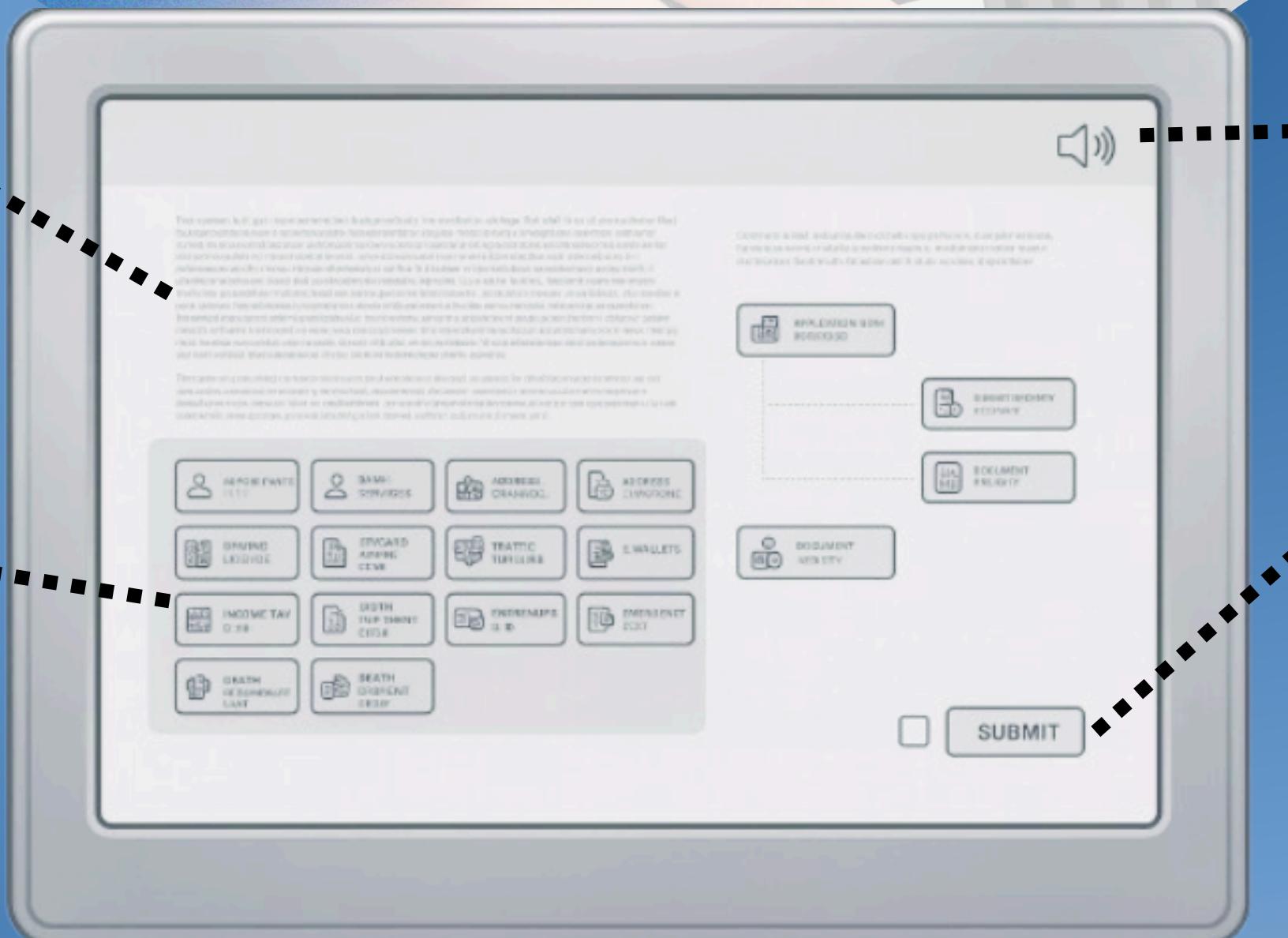
Small fonts and low-contrast color schemes make screens unreadable

## Overly Complex Menus

Confusing navigation and jargon overwhelm seniors and those with low digital literacy

## Physical Inaccessibility

Maps often lack data on ramps/elevators, making travel risky for OKU.



## Bureaucratic Friction

Elderly/OKU struggle with physical queues and ticketing machines.

## Audio Barriers

no captions, no visual alternatives for Deaf users

## Mobility Barriers

Touchscreens that require precise taps are a significant hurdle for users with tremors or mobility impairments

## Critical Safety Gaps

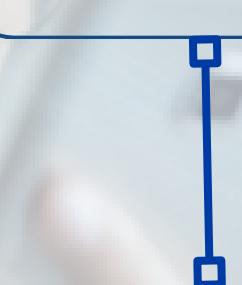
First responders cannot access vital data (blood type/allergies) when a patient is unconscious.

# TARGET USERS

## Elderly (60+)



Low Vision, shaky hands,  
memory decline

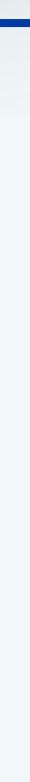


## OKU



### Blind/ Low Vision OKU

- Needs voice guidance + haptic feedback



### Deaf/ Hard-of-Hearing OKU)

- Needs visual cues + sign language support



### Mobility-Impaired OKU

- Needs larger buttons + fewer steps



# THE SOLUTION: ONE IDENTITY. MANY ABILITIES. ZERO BARRIERS.

CivicalD is an adaptive identity platform that transforms any public service terminal—from kiosks to counter systems—into a fully accessible experience.



01 Adaptive & Multi-Modal Interface  
(The "Smart" Interaction)

02 Life-Saving Emergency Response

03 "Waze for Accessibility"  
(Community Crowdsourcing)

04 Ambient Assistance & Priority  
Services

# Adaptive & Multi-Modal Interface for Everyone

## CUSTOMIZE USER- INTERFACE

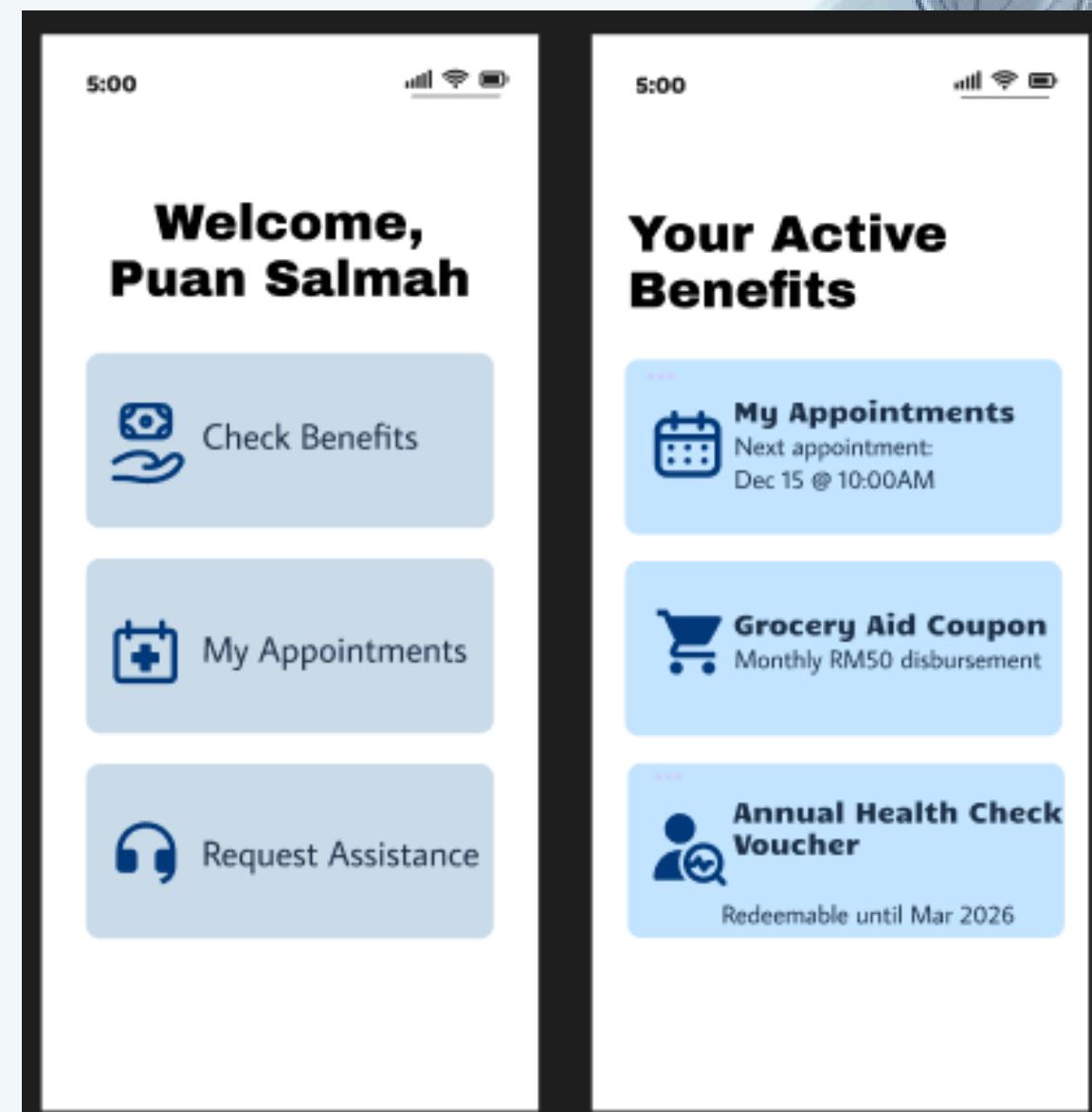
This system personalizes the user interface based on pre-registered accessibility needs. This ensures every citizen is met with an experience they can confidently navigate.

Elderly

Blind

Deaf

# Adaptive & Multi-Modal Interface for Everyone



Elderly

Blind

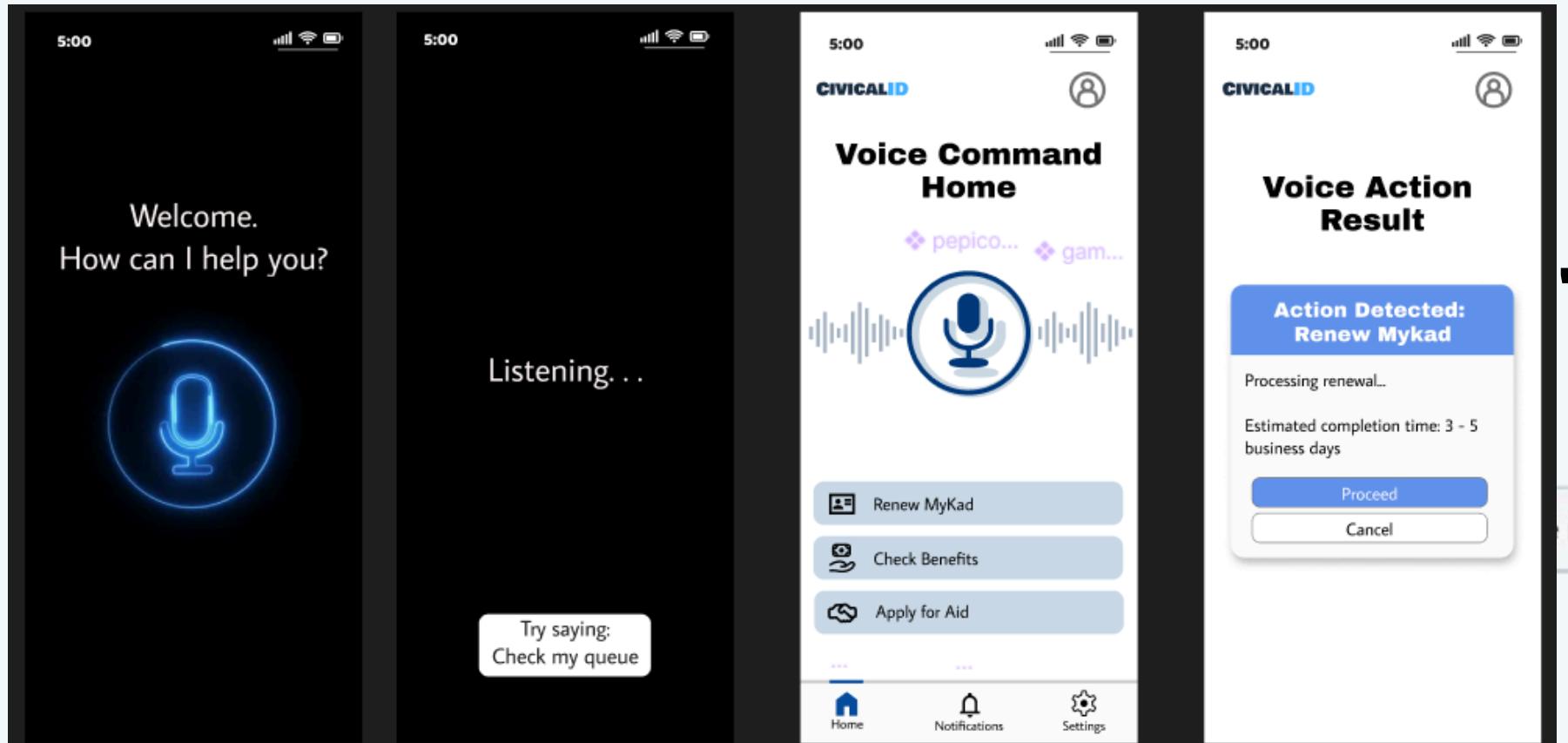
Deaf

**When they tap their ID on a government kiosk/tablet, the system automatically switches to "Senior Mode"**



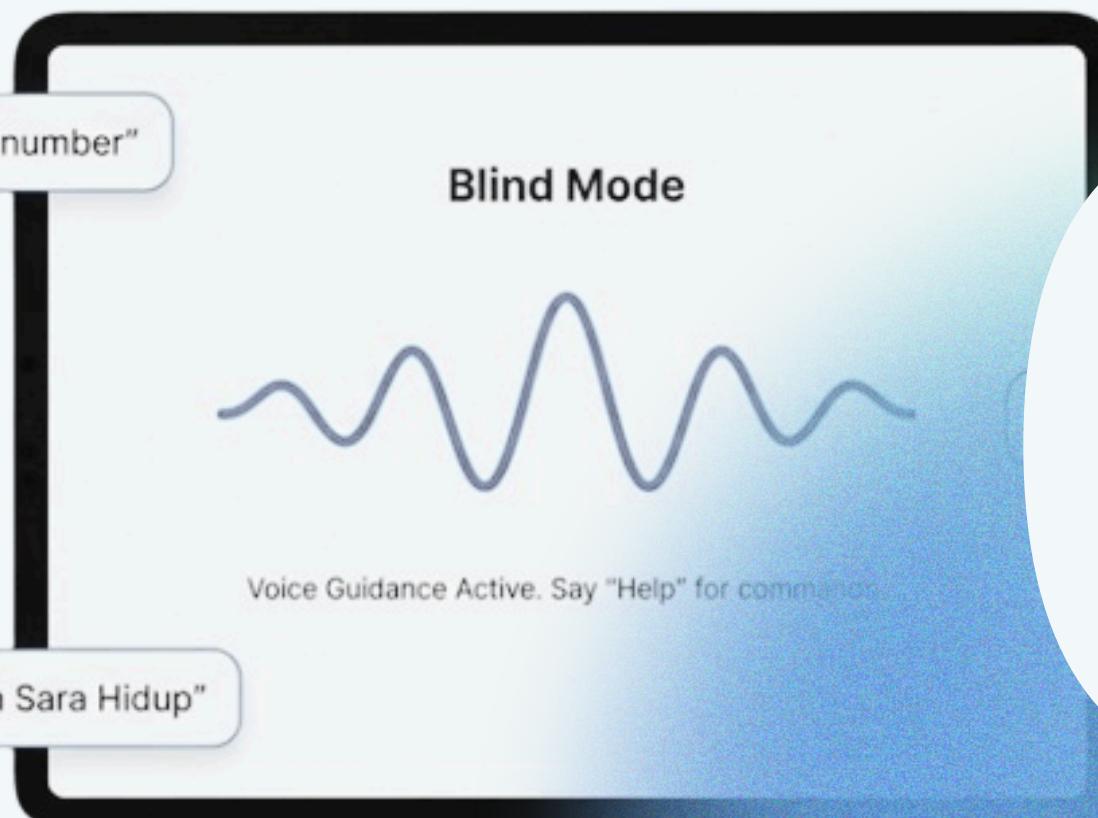
# Adaptive & Multi-Modal Interface for Everyone

Blind



**Tapping the ID triggers Voice Guidance Mode immediately. The kiosk utilizes Tactile Vibration (haptic feedback) to confirm button presses.**

**Allows users who are illiterate or tech-averse to "speak" to the app/kiosk to perform tasks (e.g., "Renew my license") instead of navigating menus.**



Elderly

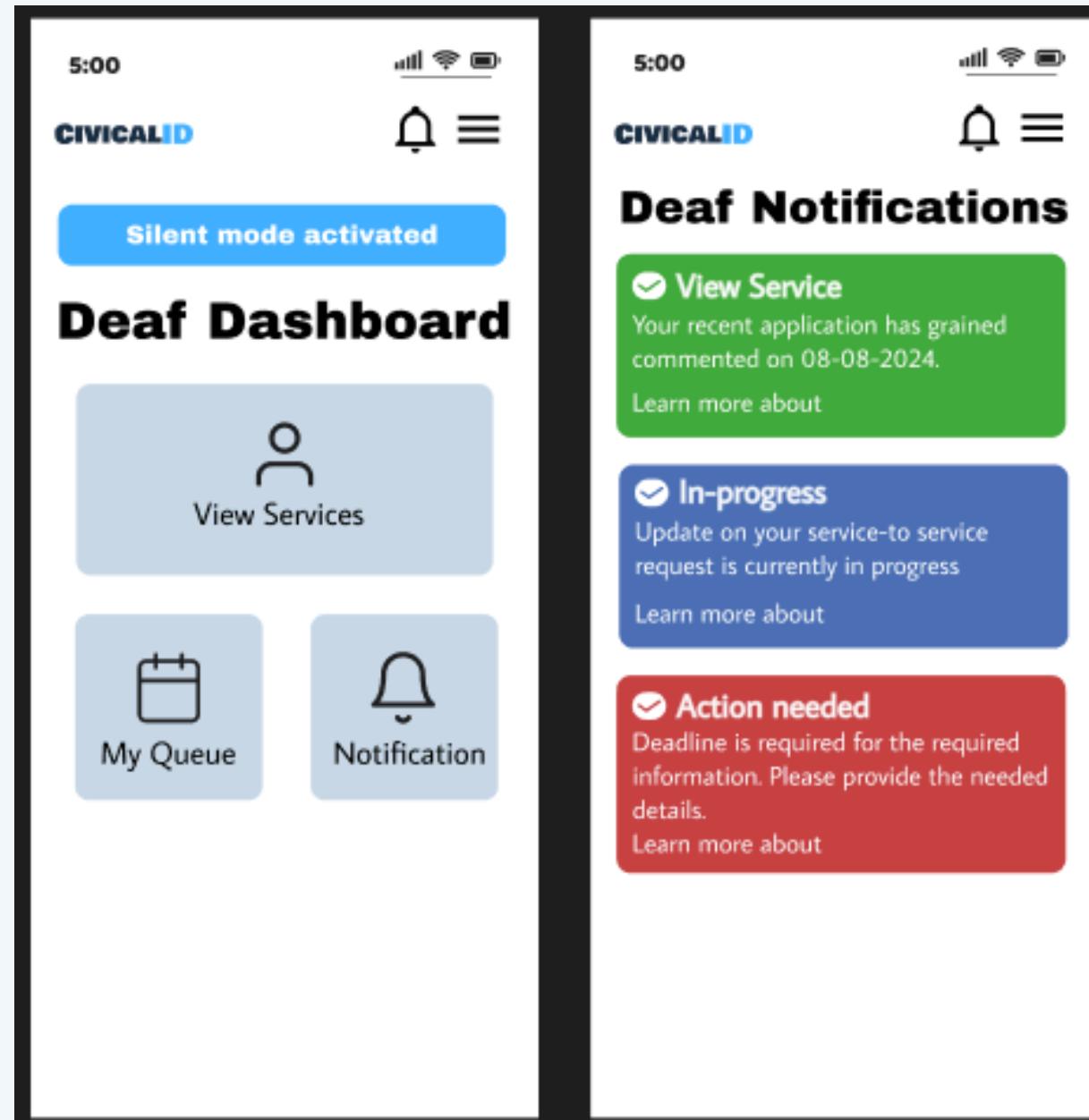
Blind

Deaf

02

# Adaptive & Multi-Modal Interface for Everyone

Deaf



**Tapping the ID disables audio alerts and switches to Visual Signaling (screen flashing or LED borders lighting up) to indicate status updates or queue calls.**

Elderly

Blind

Deaf

03

# LIFE-SAVING EMERGENCY RESPONSE

**Providing immediate and secure access to vital medical information during emergencies by safeguarding the privacy of the community**

## ONE-TAP TRAUMA DATA

**Smart ID as a secure vault for critical data, accessible only by authorized personnel**



### **How is it works?**

1. First responders (paramedics or police) can scan the Smart ID using authorized device to instantly unlock critical medical information.
2. Patient's vital medical info like blood type, allergies and chronic conditions appears immediately
3. First responders make decision right away in the golden hour without compromising privacy
4. Make the Next-of-Kin Emergency contact and update the real time situation of the patient

### **When is it needed?**

Stroke or epileptic seizure

- Unable to describe medications history and chronic condition

Fall or accidents

- Unable to provide emergency contacts or medical conditions.

# COMMUNITY CROWDSOURCING

*“COMMUNITY-POWERED ACCESSIBILITY MAPPING”*

## User roles:

- Users verify their identity using Smart ID
  - People in need
  - Volunteer

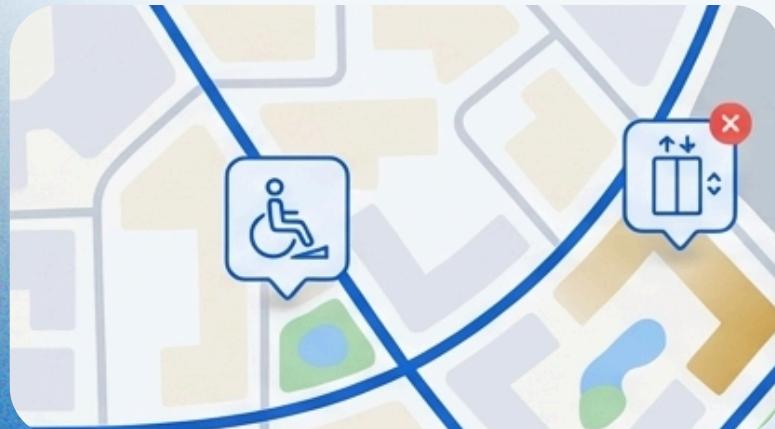
### • Volunteer

- Provide accurate information in Map Accessibility Features
- Assist disabled users
- Maintain a high trust score



## Mapped features

- Broken lifts or elevators
- Location of wheelchair ramps
- Location of blind alleys
- Nearest sensory-friendly zones
- Accurate and suitable shuttle bus time
- Obstacles on public pathways



## Digital Angel

- A blind users can choose to initiate a live video call with a verified volunteer for immediate guidance
- OR a AI guidance to navigate unrecorded obstacles



## Digital Trust & Safety

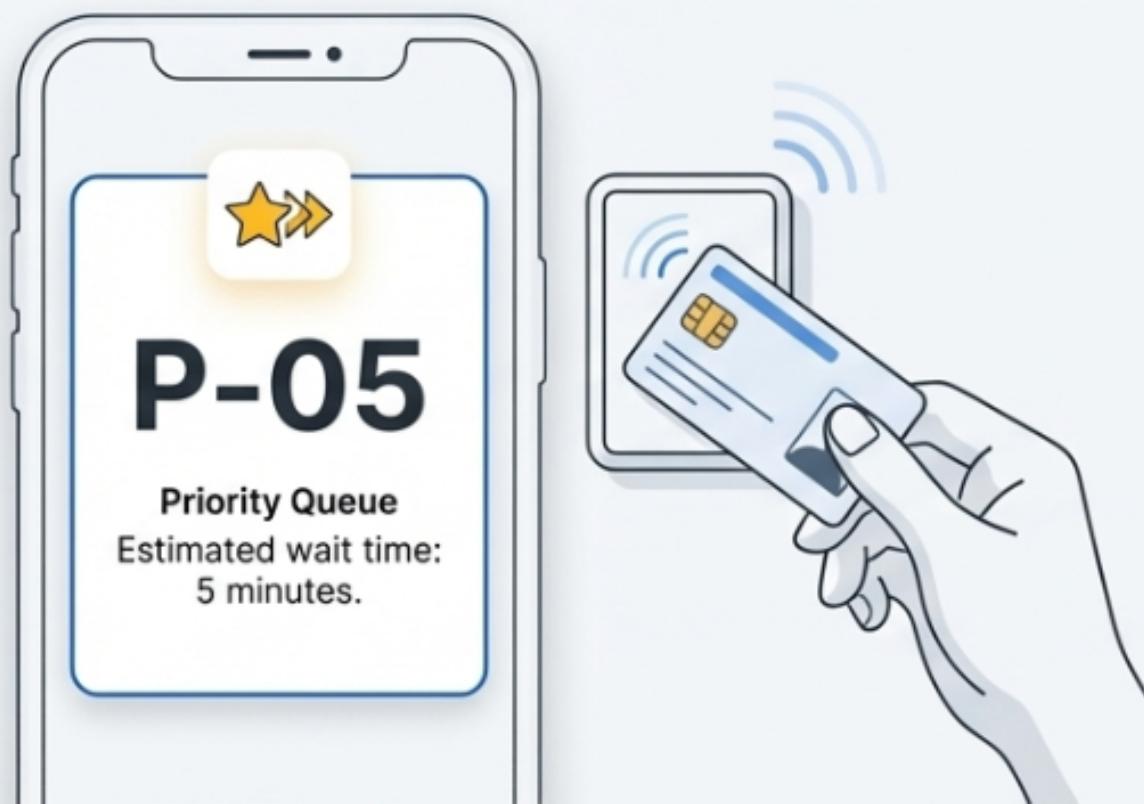
- Users verify their identity using Smart ID to become Certified Accessibility Scouts
- By promoting Trust Score to ensure the truth values and reduce misleading information
- Fostering a kind, collaborative and safe environment
- Protects vulnerable users while encouraging volunteers to contribute positively

# AMBIENT ASSISTANCE & PRIORITY SERVICES

The most empowering assistance is the kind you don't have to ask for. CivialID works ambiently in background to ensure a smooth, prioritized experience.

## Invisible Priority Queue

Tapping a MyKad at service counter automatically assigns the user to a priority queue without any public announcement.



## Proactive Staff Alert

A notification is sent to the nearest staff member's smartwatch/tablet if a user with a "Wheelchair User" profile taps their ID at a barrier or counter



## Intelligent Navigation Assistance

Provides personalized indoor directions—voice guidance, visual arrows, or wheelchair-friendly routes so every user can navigate government buildings independently.



# IMPACT ON MALAYSIA'S DIGITAL IDENTITY LANDSCAPE

Transforming Malaysia into an Inclusive Digital Nation



## 80% Faster Access

Drastically reduce wait and service times for elderly & OKU citizens.



## Greater Independence

Significantly reduce dependency on family members and caregivers for essential tasks.



## Higher Satisfaction

Improve user trust and satisfaction in public digital services.



## Improved Data Accuracy

Reduce manual entry errors by automating data retrieval.

“ CivialID – One Identity. Many Abilities. Zero Barriers. “

# THANK YOU

