

E-Namecard: Design Thinking Process

City Developments Limited (CDL)

Project Overview

Project Description: E-Namecard allows City Developments Limited's staff to share QR code and save calling card information on their contacts using the CityNexus mobile app.

Technologies Used: Figma, Invision, Sketch, Confluence, Jira, HTML, CSS, Javascript, IOS, Android, Java, Agile, SQL

Period: Oct 2023 - Nov 2023

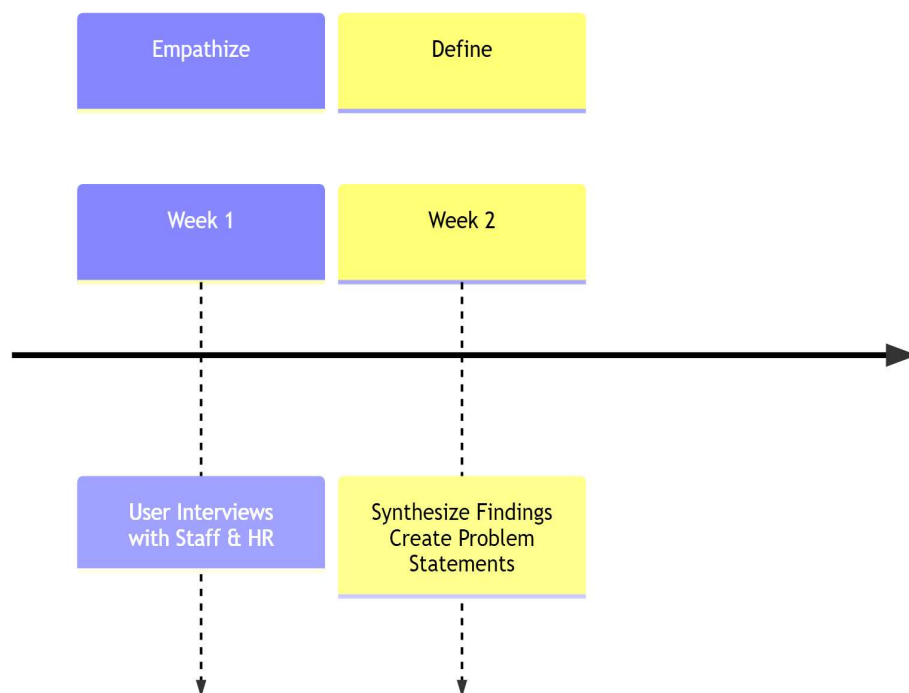
Position/Role: UX UI Designer / Tester

Services Provided: User research, gather requirements, create wireframes, user flows, prototyping, style guide and user testing

Project Size: 8 team members

Accomplishments: Reducing cost for printing business cards, environment friendly

Design Thinking Timeline : E-Namecard Project



1. EMPATHIZE

User Research Activities:

- Staff interviews on current contact sharing pain points
- HR/Administrator workshops on cost analysis
- Visitor feedback collection
- Physical card usage analysis

Key Findings:

- High printing costs for business cards
- Environmental waste concerns
- Inconvenience of carrying physical cards
- Manual contact entry errors

2. DEFINE

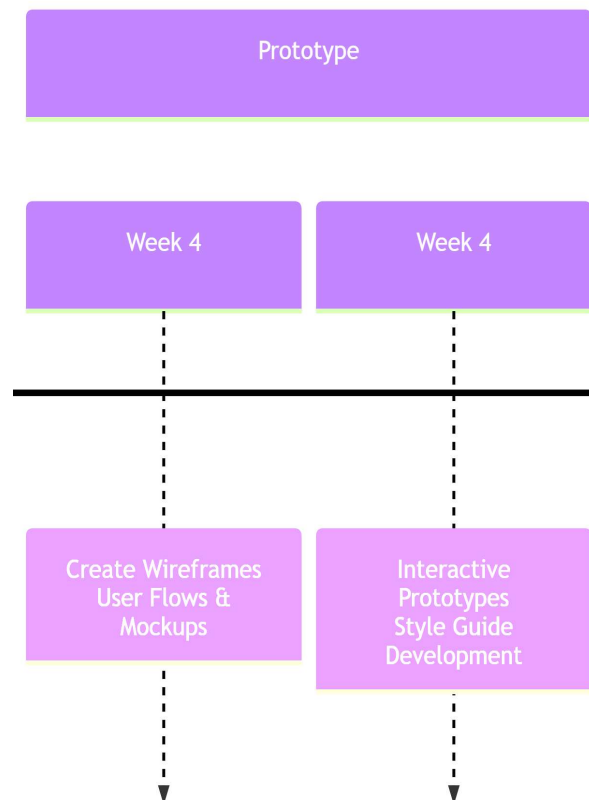
Problem Statements:

- "CDL staff need a quick, reliable, and professional way to share contact information digitally"
- "The company needs to reduce operational costs while maintaining brand consistency"

3. IDEATE

Solution Concepts:

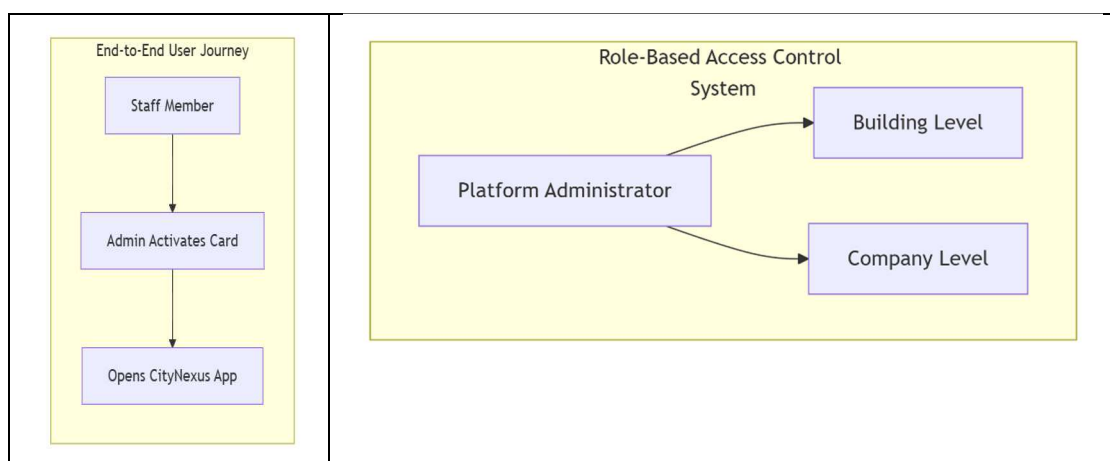
- QR code integration within existing CityNexus app
- Role-based administrative control system
- Three-step user flow: SHOW → SCAN → VIEW
- Permission matrix for different company roles

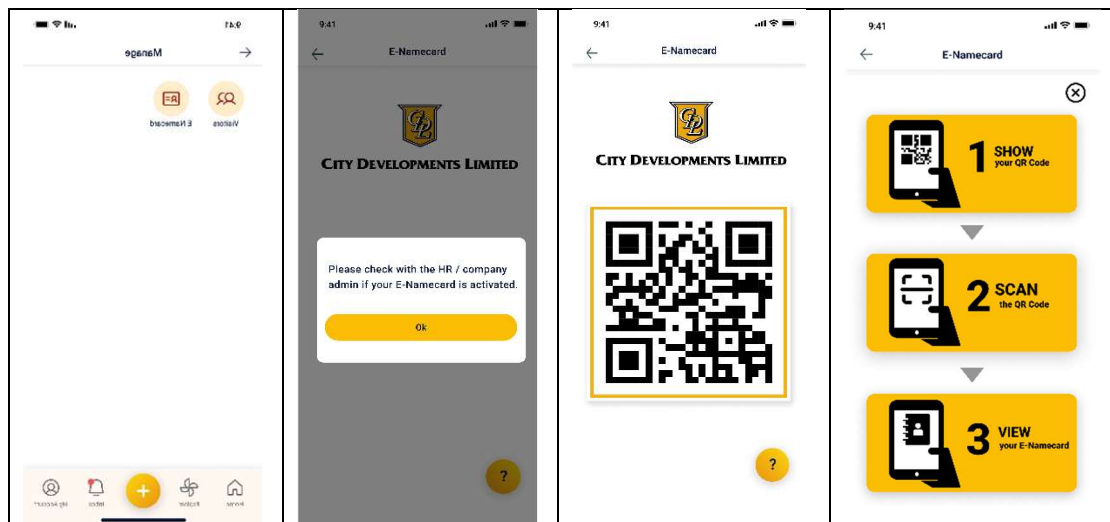
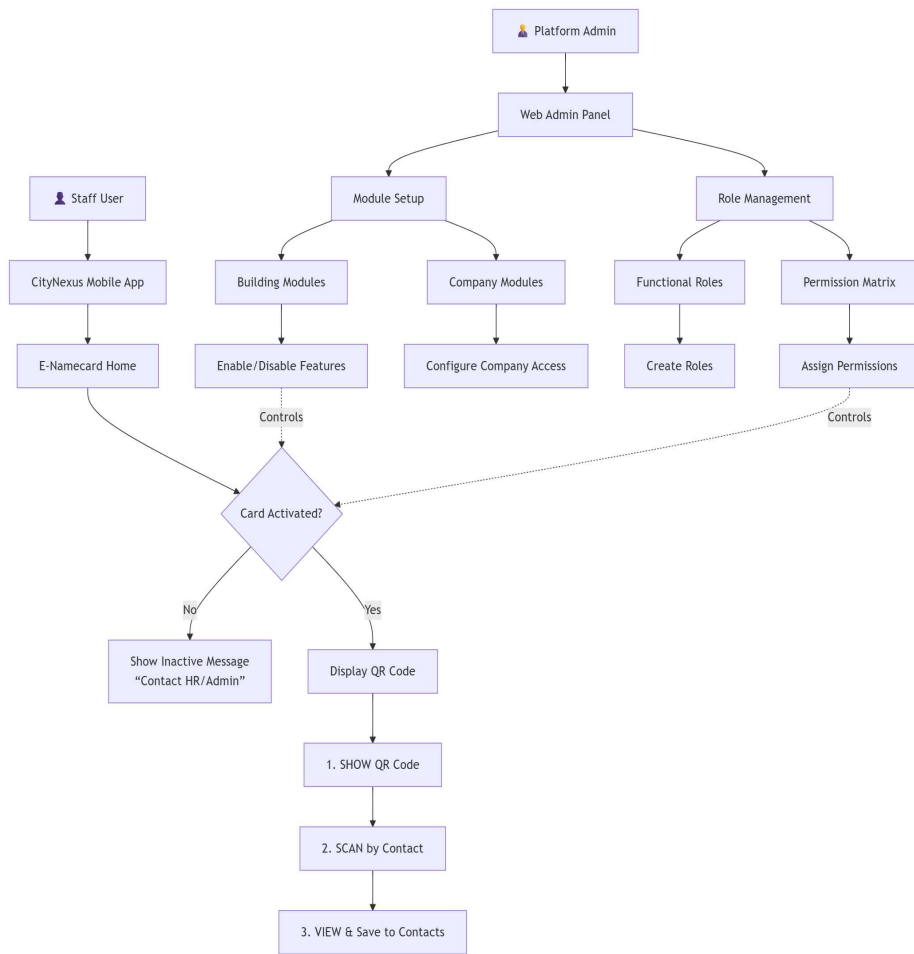


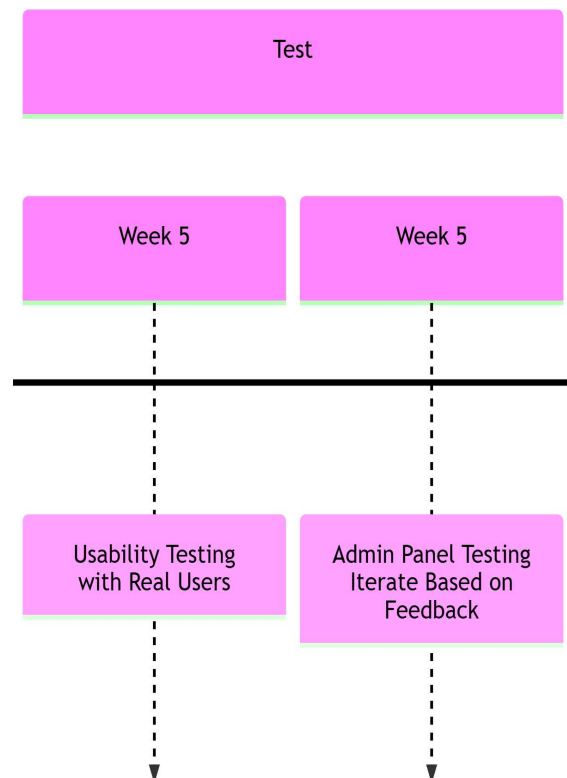
4. 🛠️ PROTOTYPE

Artifacts Created:

- User flow diagrams
- Low-fidelity wireframes
- Interactive prototypes (Figma/InVision)
- Style guide and design system
- Admin panel mockups



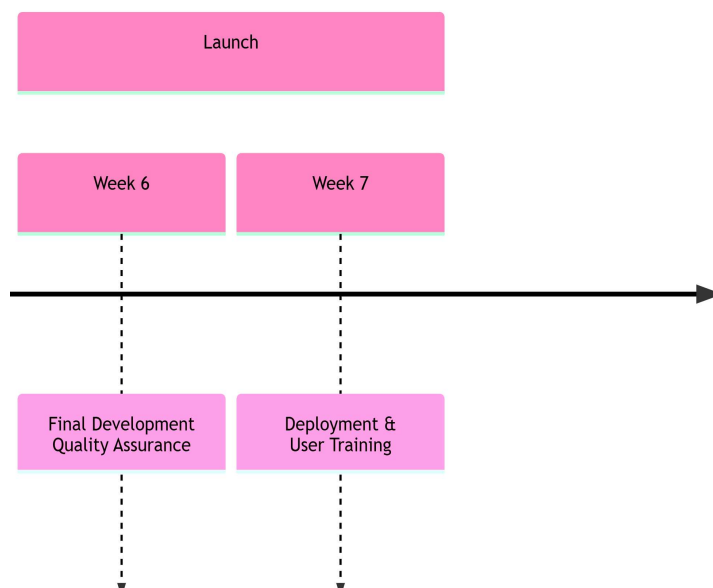




5. 🧪 TEST

Validation Activities:

- Usability testing with CDL staff
- Admin panel testing with HR/IT teams
- Iterative design improvements
- Error state validation



System Architecture

User Roles & Permissions

End Users:

- CDL Staff Members
- Building Visitors/Tenants

Administrators:

- Platform Administrators
- HR Managers
- Company Admins

Core Components

Mobile App (CityNexus):

- E-Namecard tab integration
- QR code display interface
- Contact saving functionality
- Status checking (active/inactive)

Web Admin Panel:

- Module management system
- Role-based access control
- Company permission matrix
- User activation controls

CityNexus

User Name

Dashboard

Buildings

Companies

Users

Role

Settings

Platform Administrator

< Update Building & Administrator

Building Details

Building name

Address

Postal code

Republic Plaza 2

9 Raffles Place

123456

Contact no.

Email

Building identifier

+ 65

88888888

contactus@republicpaza.com

2321423

Building Administrator Details

Name

Email

Reset password

John Wong

john.wong@cdl.com.sg

Access

Access

Vendor

Yes

RP KABA

Modules

Building Modules

☒ Building Role Management

☒ Happenings

☒ Main Hero Bar

☒ Company Management

☒ Dashboard

☒ Visitor Statistic

Update

Company Modules

All Companies

Select Companies

☒ Decision Maker

☐ HR

☒ Finance

☒ Customer Care

☒ Access

All Companies

Select Companies

☒ Marketing

☐ Leasing

☒ Operation

☒ Visitor Management

☒ CDL E-Namecard

Update

Building Role List

Republic Plaza 2

Create

M&E Staff

Admin

Ops Manager

Ops Executive

Custom Role

Role Name

M&E Staff

☒ Building Role Management

☒ Happenings

☒ Company Management

☒ Dashboard

☒ Main Hero Bar

☒ Visitor Statistic

Update

Company Role List

Republic Plaza 2

Create

Decision Maker

Default

Marketing

Finance

Leasing

Operations

HR

Marketing & Finance

HR & Finance

Role Name

Marketing & Finance

☒ Decision Maker

☒ Marketing

☒ HR

☒ Leasing

☒ Finance

☒ Operation

☒ Customer Care

☒ Visitor Management

☒ Access

☒ CDL E-Namecard

Update

Delete

Confirm

CityNexus

User Name

Dashboard

Buildings

Companies

Users

Administration

Settings

Platform Administrator

< Building Module Setup

1

2

3

4

Modules

Building Modules

☒ Building Role Management

☒ Happenings

☒ Main HeroBar

☒ Company Management

☒ Dashboard

☒ Visitor Statistic

Company Modules

All Companies

Select Companies

☒ Decision Maker

☐

☒ HR

☐

☒ Finance

☐

☒ Customer Care

☐

☒ Access

☐

All Companies

Select Companies

☒ Marketing

☐

☒ Leasing

☐

☒ Operation

☐

☒ Visitor Management

☐

☒ CDL E-NameCard

☐

Next

CityNexus

User Name

Dashboard

Buildings

Companies

Users

Administration

Settings

Platform Administrator

< Company Role List Setup

1

2

3

4

Functional Role

Company Role List

Create

Setting Role

Republic Plaza 2

Decision Maker

Default

Marketing

Finance

Leasing

Operations

HR

Marketing & Finance

HR & Finance

Role Name

HR & Finance

☒ Decision Maker

☒ Marketing

☒ HR

☒ Leasing

☒ Finance

☒ Operation

☒ Customer Care

☒ Visitor Management

☒ Access

☒ CDL E-NameCard

Update

Delete

Confirm

User Flows

Staff Member Flow

1. **Open** CityNexus mobile app
2. **Navigate** to E-Namecard tab
3. **Check** activation status
4. **Display** QR code (if active)
5. **Share** with contact
6. **Contact scans** and saves information

Administrator Flow

1. **Login** to admin panel
2. **Configure** building modules
3. **Setup** company roles
4. **Assign** permissions
5. **Activate** E-Namecard for users
6. **Monitor** usage statistics

Key Screens & Features

Mobile App Screens

1. **E-Namecard Home** - Main access point in app navigation
2. **QR Display** - Clear SHOW→SCAN→VIEW instructions
3. **Inactive State** - Guidance to contact HR/Admin
4. **Brand Splash** - CDL branding reinforcement

Admin Panel Features

1. **Module Toggle System** - Enable/disable features per building
2. **Role Management** - Define functional roles and permissions
3. **Company Access Matrix** - Granular control per company/role
4. **Building Assignment** - Role assignment to specific locations

Technical Implementation

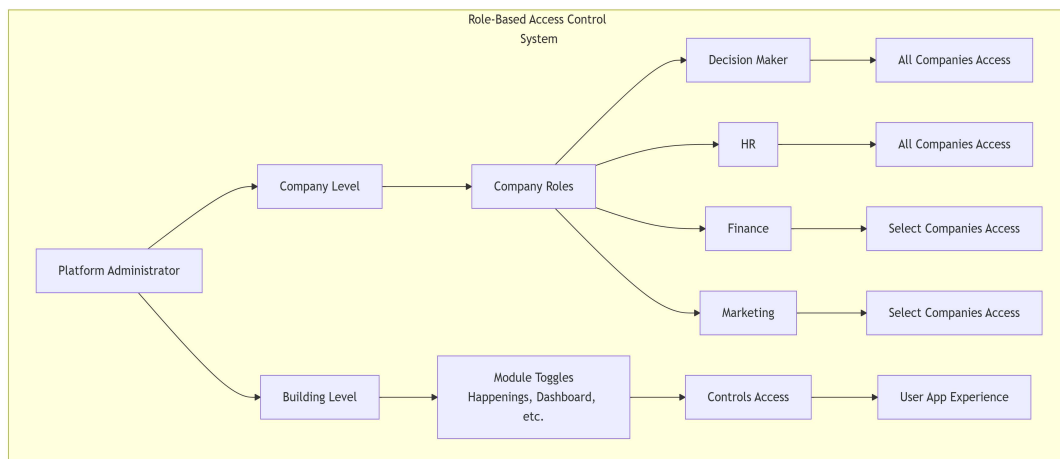
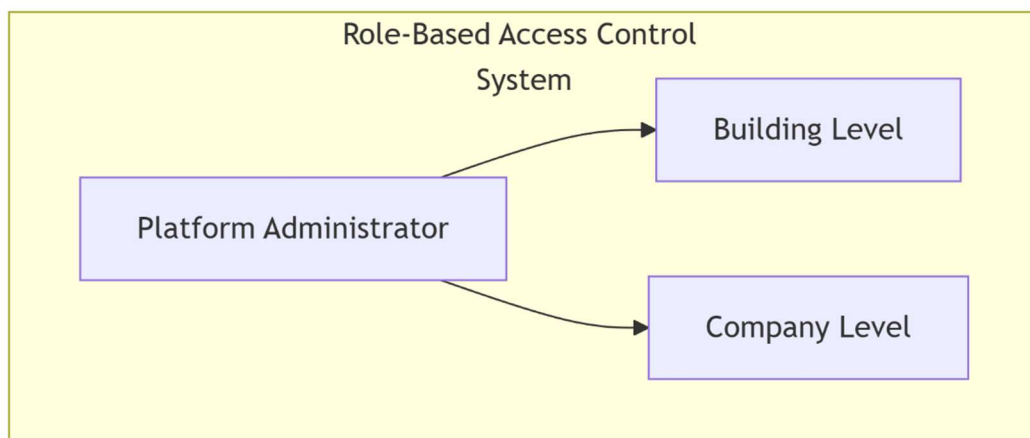
Permission Matrix Structure

Building Level Modules:

- Building Role Management
- Happenings
- Main Hero Bar
- Company Management
- Dashboard
- Visitor Statistic

Company Role Access:

- Decision Maker: All Companies
- HR: All Companies
- Finance: Select Companies
- Customer Care: All Companies
- Access: All Companies



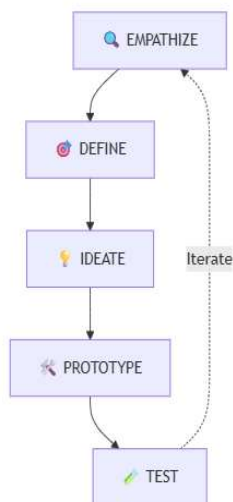
Success Metrics

Quantitative Measures

- Reduction in business card printing costs
- Number of digital card shares per month
- User activation rates
- Admin configuration time reduction

Qualitative Benefits

- Improved user convenience
 - Enhanced brand consistency
 - Environmental impact reduction
 - Better contact management
-



Project Timeline

Week 1-2: Empathize & Define

- User research and requirement gathering
- Problem statement formulation

Week 3-4: Ideate & Prototype

- Solution brainstorming and wireframing
- Interactive prototype development

Week 5-6: Test & Iterate

- Usability testing sessions

- Design refinements and improvements

Week 7: Launch Preparation

- Final quality assurance
 - User training materials
 - Deployment planning
-

Conclusion

The E-Namecard project successfully transformed traditional business card usage into a digital, efficient, and environmentally friendly solution. Through careful application of the Design Thinking process, the team delivered a user-centric solution that addresses both staff convenience and organizational cost-saving objectives while maintaining robust administrative controls essential for enterprise deployment.

Document Prepared By: UX/UI Design Team

Date: December 2023

Project Status: Completed 
