

# STRAY FINDER

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# FLOW OF EVENTS

01

## INTRO & OVERVIEW OF FUNCTIONALITIES

Breakdown of how the  
Stray Finder app works

02

## DEMO

Demo of the main  
functionalities of the app

03

## GOOD SE PRACTICES

Discussion of good SE  
practices observed during  
the project

04

## GOOD TRACEABILITY

Demonstration of good  
traceability with specific  
use cases

05

## TESTING

Testing test cases

06

## Q&A

We'll be glad to answer  
your questions!





01

INTRO &  
OVERVIEW OF  
FUNCTIONALITIES



# Introduction



## Problem

- Passersby don't necessarily know how to help injured stray cats
- Volunteers from animal shelters unable to easily track stray cats



## Our Solution

Develop a stray cat network system enabling volunteers & passersby to report injured cats



# Target Audience & Intended Usage

## Target Audience:

- Volunteers from animal shelters/pet care organizations
- General public (passersby)

## Intended Usage:

- Report stray cats (injured/uninjured)
- Pinpoint location of reported injured cats
- Locate vets within proximity to user



# Primary Features



Report a Cat



Cat  
Noticeboard



Cat Map



Find a Vet



Adopt a Cat



# MAIN FUNCTIONALITIES BY TYPE OF USER

## Passerby



- Report Stray Cat (Breed Predictor API) & Report Injury
- Vet Map (GovData API, Google Maps API)
- Adopt - a - cat page

## Volunteer



- Injury Noticeboard & Handle Injury
- Vet Map (GovData API, Google Maps API)
- Cat Map (Google Maps API)
- Login & Register
- Edit Profile



02

DEMO



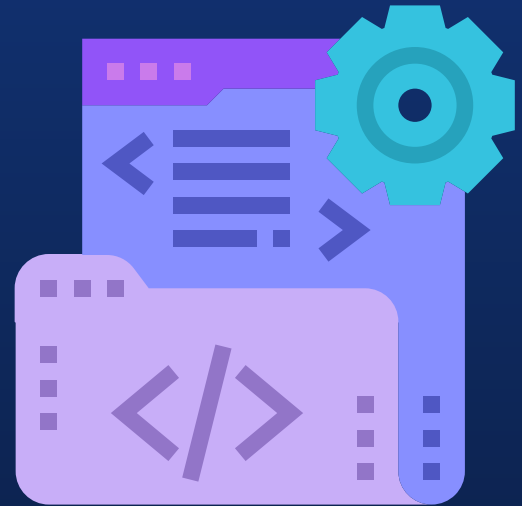


Let's now do the live demo!



# 03

## GOOD SE PRACTICES





# SINGLE RESPONSIBILITY PRINCIPLE

- Every **class** has one job
  - e.g. StrayCatMngr handles get and set methods pertaining to stray cat only, while UserVolunteer handles get and set methods for user volunteer only
- Every **UI** has one job
  - e.g. LoginUI and RegistrationUI are separate and handle login and registration only respectively



# ENCAPSULATION: ENTITY-CONTROL-BOUNDARY



## ENTITY

Represents long-lived information relevant to stakeholders

- AdoptOrg



## CONTROL

Processing and logic to coordinate and control objects involved in use case

- LoginMngr
- RegistrationMngr
- StrayCatMngr
- Injured
- AdoptMngr
- UserVolunteer etc.



## BOUNDARY

Interaction with external actors (users and external systems)

- UI to interact with user and take in input when prompted
- GovDataAPI
- Breed Detector API



# HOW OUR DESIGN SUPPORTS FURTHER UPGRADES

- ReportUI
  - If we want to add more functionalities to our report function eg report of death of an existing stray cat, we can easily add the removeCat method to the ReportUI and do not need to make any other changes in order to accommodate the change



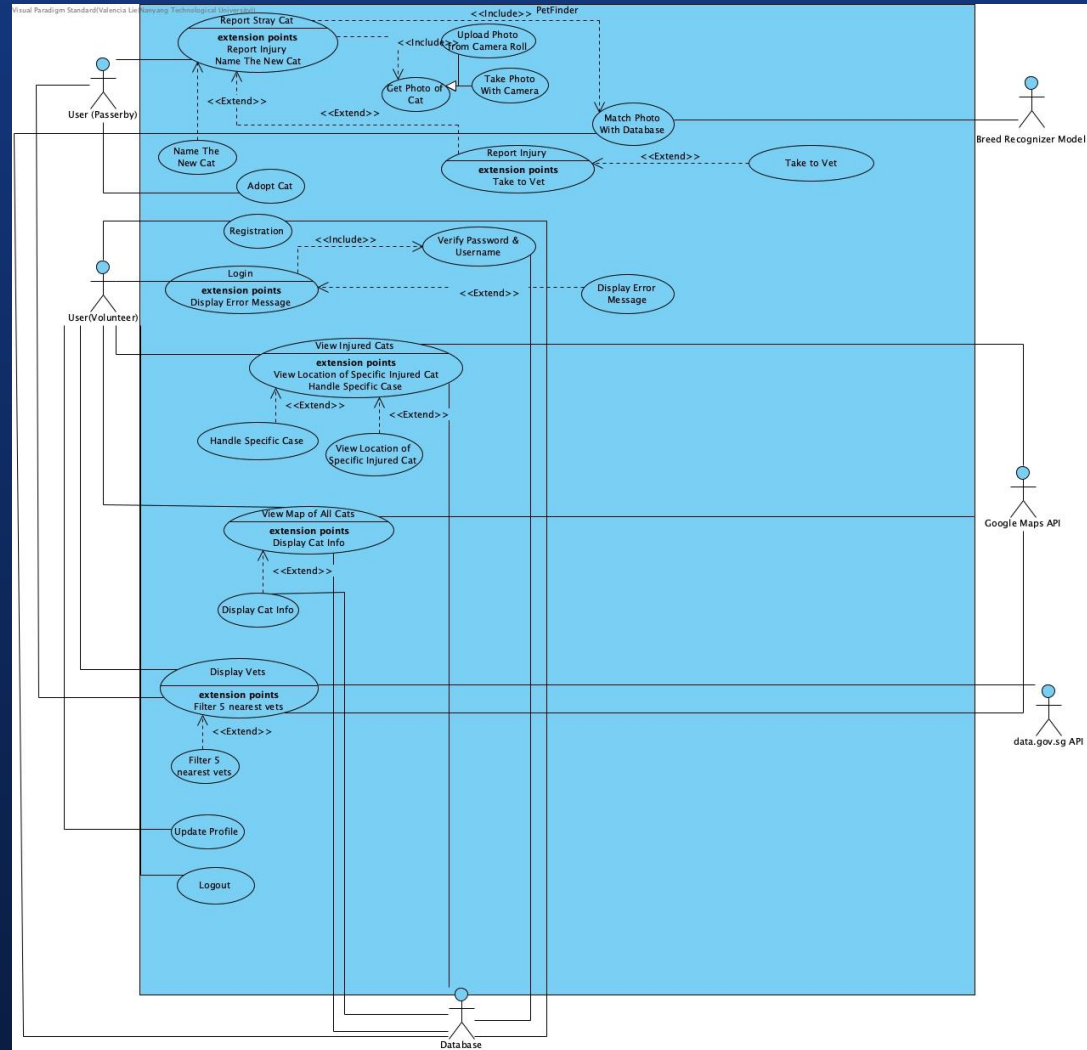


# 04

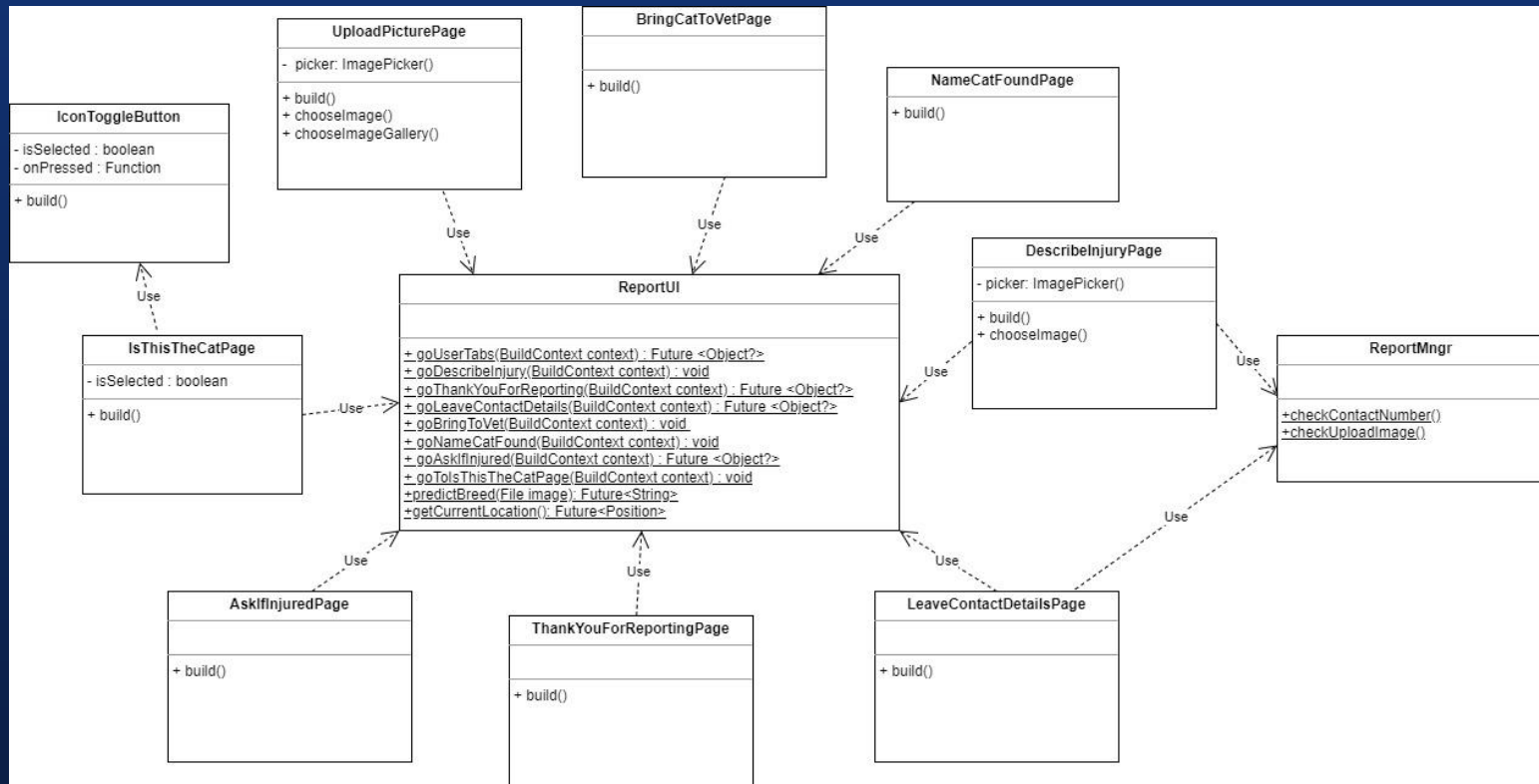
GOOD  
TRACEABILITY



# USE CASE DIAGRAM

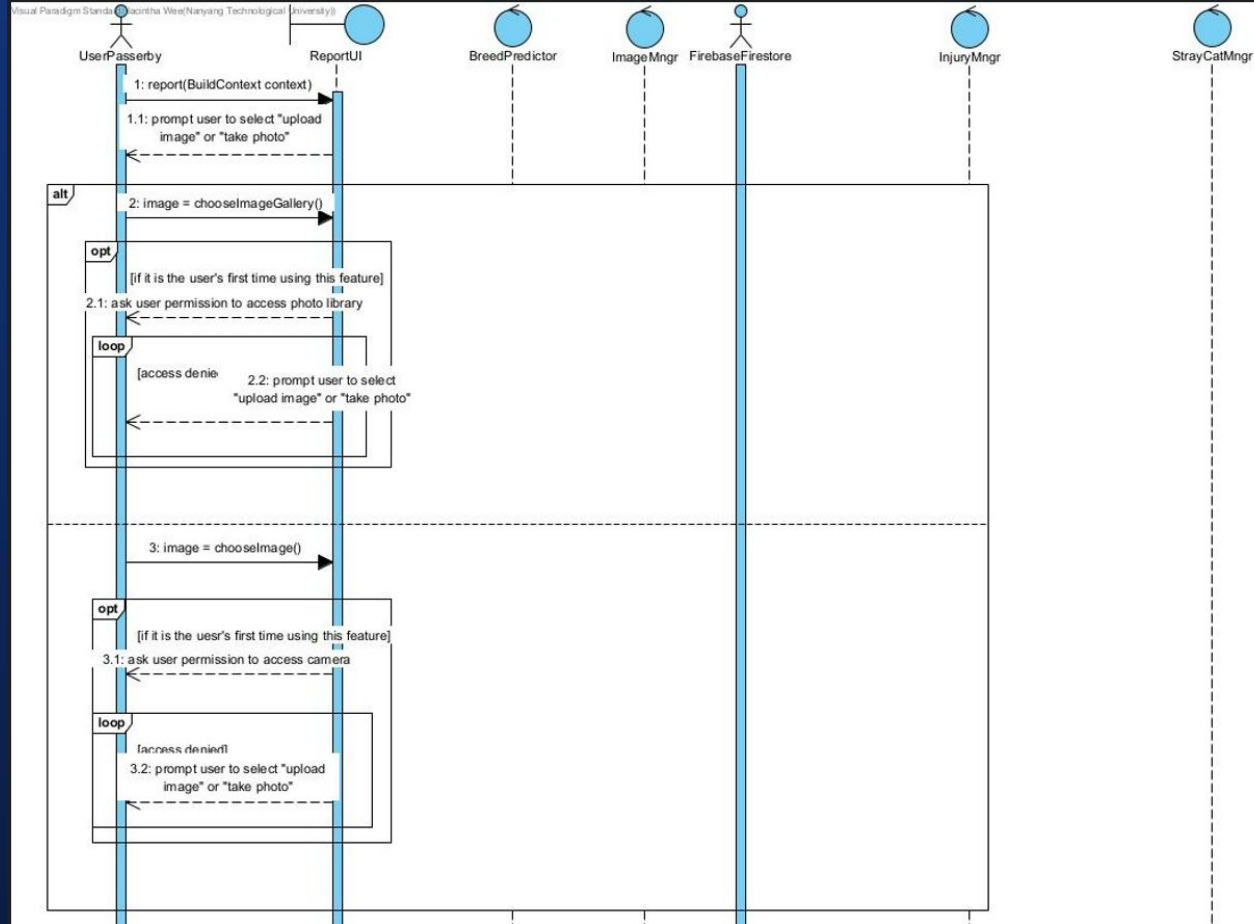


# Class Diagram – Report Function

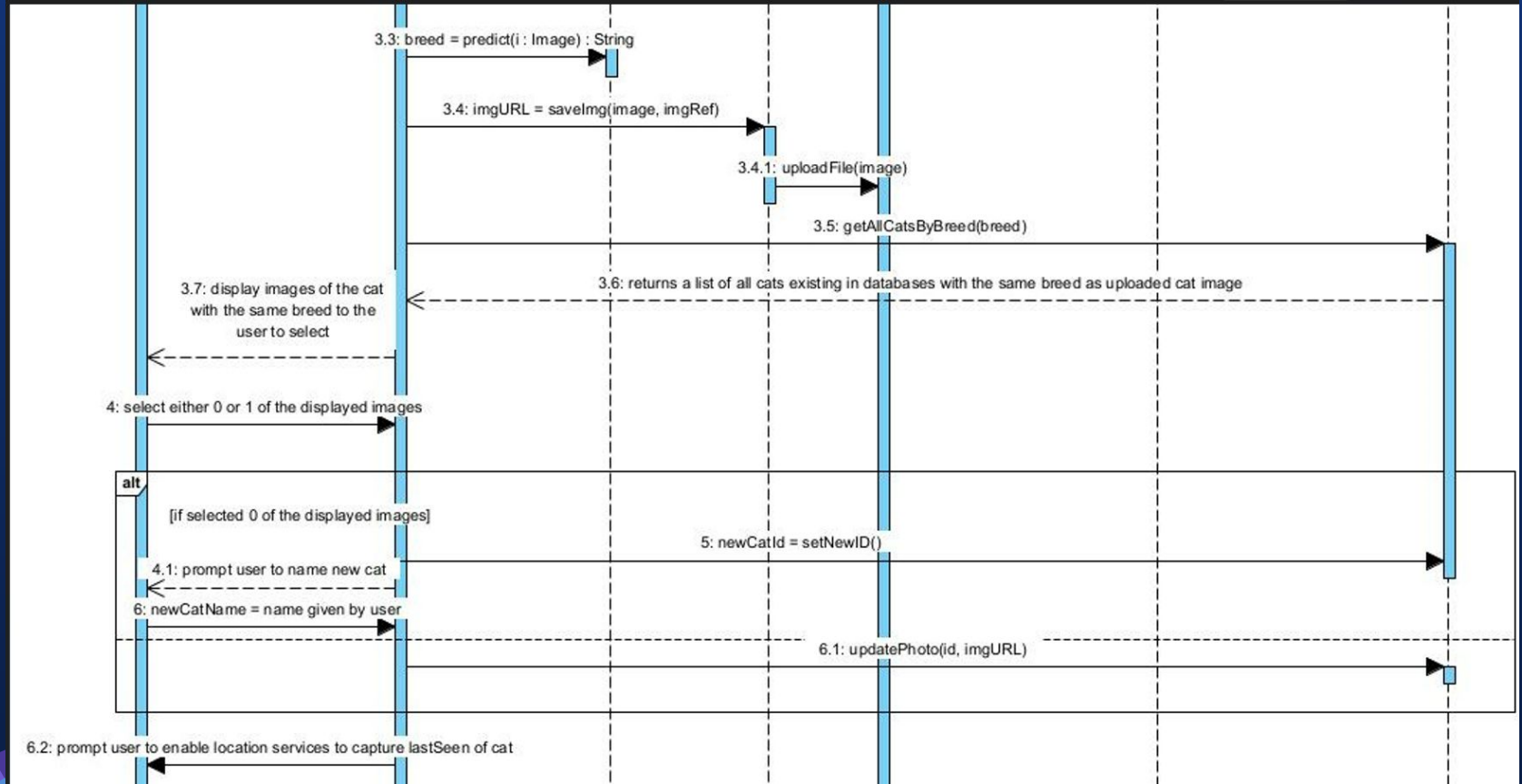




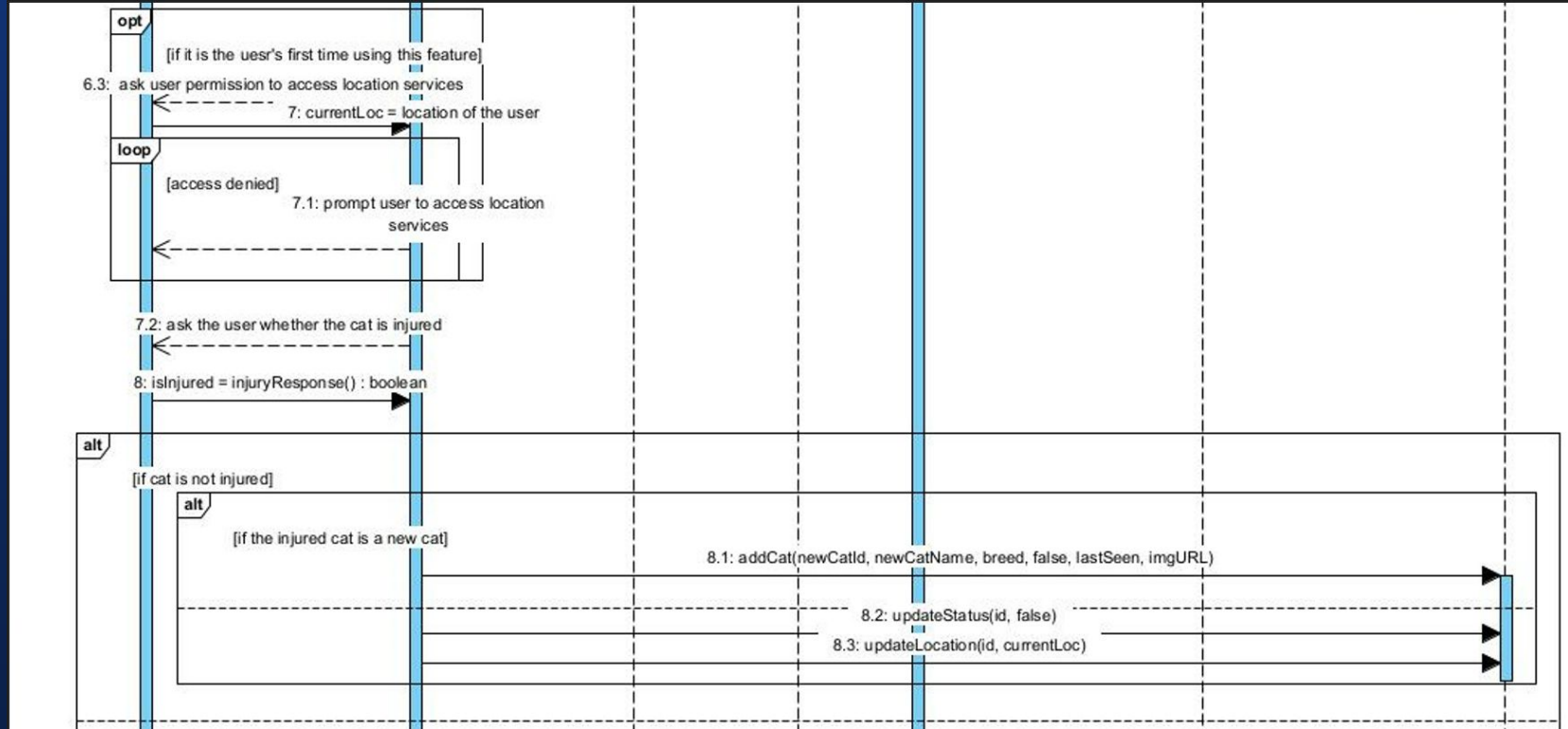
# Sequence Diagram – Report Function



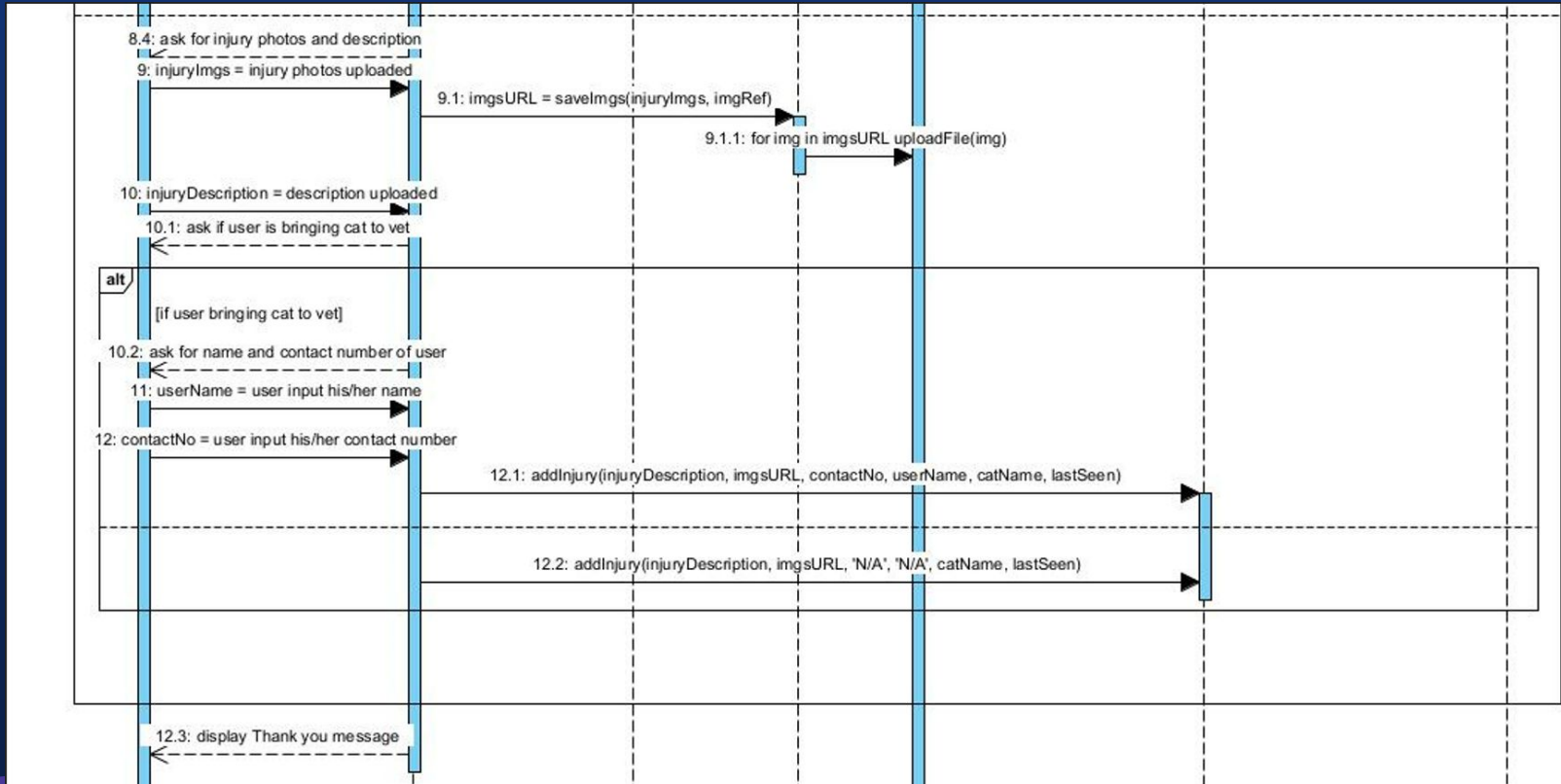
# Sequence Diagram cont.



# Sequence Diagram cont.



# Sequence Diagram cont.





05

TESTING



# Black Box Testing

- Test Cases based on input within the Registration & Edit Profile pages of application
- Equivalent Class & Boundary Value Testing (valid vs invalid inputs)
- Control Classes tested: LoginMngr, RegistrationMngr

# Registration

Test Case 1: User(volunteer) registers for the first time.				
	Test ID	Input Description	Expected Output	Actual Result
Organisation Name	1	spca (spca is already registered in our database)	showing that there is a duplicate organisation name after register button is pressed	Dialog Box showing that there is a duplicate organisation name after register button is pressed
	2	<a href="#">cat welfare society (it has not been registered in our database yet)</a>	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed	Screen reloads and navigates to login page after register button is pressed

# Registration

Email address	3	<a href="mailto:spca@email.com">spca@email.com</a> (spca's email is already registered in our database)	Dialog Box showing that there is an existing email address in our database	Dialog Box showing that there is an existing email address in our database
	4	spca	Dialog Box showing that the email address is invalid due to incorrect format after register button is pressed	Dialog Box showing that the email address is invalid due to incorrect format after register button is pressed
	5	<a href="mailto:catwelfaresociety@email.com">catwelfaresociety@email.com</a>	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed



# Registration

Password	6		Dialog Box showing that the minimum character of password is 6 after register button is pressed	Dialog Box showing that the minimum character of password is 6 after register button is pressed
	7		Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed

# Registration

	8	123456	Register button is disabled if phone number length is not equal to 8	Register button is disabled if phone number length is not equal to 8
	9	1234567891	Register button is disabled if phone number length is not equal to 8	Register button is disabled if phone number length is not equal to 8
	10	1234567#	Dialog Box showing that the phone number must be all digits	Dialog Box showing that the phone number must be all digits

# Registration

Phone number	11	12345678	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed
Address	12	Singapore 123456	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed	Loading GIF is displayed, screen reloads and navigates to login page after register button is pressed
Any text field	13	If any text field is not filled	Register button is disabled	Register button is disabled

# Edit Profile

Test Case 2: User(volunteer) edits their own profile				
	Test ID	Input Description	Expected Output	Actual Result
Organization Name	1	spca (spca is already registered in our database) 2. User (volunteer) presses 'back' arrow from map page.	Dialog Box showing that there is a duplicate organisation name after register button is pressed 2. Redirection to "noticeboard" page	Dialog Box showing that there is a duplicate organisation name after register button is pressed
	2	cat welfare society (it has not been registered in our database yet)	Dialog box showing information is successfully updated and screen changes to display state after confirm button is pressed	Dialog box showing information is successfully updated and screen changes to display state after confirm button is pressed
	3	123456	Dialog box showing that contact number can only be of 8 digits after confirm button is pressed	Dialog box showing that contact number can only be of 8 digits after confirm button is pressed

# Edit Profile

Contact Number	4	123456789	Dialog box showing that contact number can only be of 8 digits after confirm button is pressed	Dialog box showing that contact number can only be of 8 digits after confirm button is pressed
	5	1234567+	Dialog box showing that contact number can only be of digits after confirm button is pressed	Dialog box showing that contact number can only be of digits after confirm button is pressed
	6	12345678	Dialog box showing information is successfully updated and screen changes to display state after confirm button is pressed	Dialog box showing information is successfully updated and screen changes to display state after confirm button is pressed

# Edit Profile

Address	7	Singapore 123456	Dialog box showing information is successfully updated and screen changes to display state after confirm button is pressed	Dialog box showing information is successfully updated and screen changes to display state after confirm button is pressed
All text field	8	If any text field is not filled	Dialog box showing that all text fields should be filled in after confirm button is pressed	Dialog box showing that all text fields should be filled in after confirm button is pressed



06

Q&A



# THANKS

Hope you like our Stray  
Finder app!



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