



# Le Fleur King Requirements Document

*Rosy Outlook*

---

Team Members:

223126756, Junaid Brooks

224078321, Ganeefa Sirkhotte

Date Submitted: <16 004 2023>

---

## TABLE OF CONTENTS

---

|          |  |           |
|----------|--|-----------|
| <b>1</b> | <b>SYSTEM OVERVIEW.....</b>                          | <b>3</b>  |
| 1.1      | Problem Description .....                            | 3         |
| 1.1.1    | Terminology .....                                    | 3         |
| 1.2      | Project Assumptions.....                             | 3         |
| <b>2</b> | <b>FUNCTIONAL REQUIREMENTS .....</b>                 | <b>4</b>  |
| 2.1      | Business Use Case Model.....                         | 4         |
| 2.2      | Use Case Glossary .....                              | 5         |
| 2.3      | Use Case Narratives (User Stories).....              | 8         |
| 2.3.1    | Package A: Basics .....                              | 8         |
| 2.3.2    | Package B: Influencer .....                          | 13        |
| 2.3.3    | Package C: System Operations.....                    | 13        |
| 2.3.4    | Package D: Admin.....                                | 14        |
| <b>3</b> | <b>NON-FUNCTIONAL REQUIREMENTS .....</b>             | <b>17</b> |
| 3.1      | Interface Requirements .....                         | 17        |
| 3.1.1    | Usability Goals .....                                | 17        |
| 3.1.2    | User Experience.....                                 | 17        |
| 3.1.3    | User Requirements .....                              | 17        |
| 3.2      | Performance Requirements.....                        | 17        |
| 3.3      | Security Requirements .....                          | 17        |
| 3.4      | Operational Requirements.....                        | 18        |
| <b>4</b> | <b>DATA REQUIREMENTS .....</b>                       | <b>19</b> |
| 4.1      | Preliminary List of data and attributes .....        | 19        |
| 4.2      | Domain Class Diagram.....                            | 20        |
| <b>5</b> | <b>PRELIMINARY SCHEDULE OF RESPONSIBILITIES.....</b> | <b>21</b> |
| <b>6</b> | <b>RESEARCHING THE REQUIREMENTS .....</b>            | <b>23</b> |
|          | 10 User Interview Questions .....                    | 23        |

# 1 SYSTEM OVERVIEW

---

## 1.1 Problem Description

The main objective of the system is to promote positive thinking and to use gratitude to make you feel better. At midnight every day the system will share a positive affirmation with users, referred to as a 'Rosebud' because this is the first bit of positivity they receive, and it will help their day bloom into a good one. At the end of each day the system prompts the user to share what they are happy about or grateful for on that day. This prompt is referred to as 'Blooming Gratitude'. The system will issue Blooming Gratitude at 14:00 and the user can answer it at any time after that.

Once the user has answered Blooming Gratitude, their answer for the previous day will no longer be visible to other users. The user is, however, able to view their own previous answers to Blooming Gratitude. Users can comment on Rosebuds and Blooming Gratitude, this is referred to as 'Watering a post'. Users can send friend requests to each other. A regular user can apply to become an influencer and an admin would process these requests. Once this is done, the user is able to view the outcome of their application. A user can follow an influencer to see all their latest posts. This does not require the influencer's approval.

An Influencer is a user who can post multiple positive messages throughout the day. A post by an influencer is referred to as a 'Petal'. Petals are grouped into different categories. Each category is referred to as 'Flower'. The influencer's collection of Flowers is known as their 'Garden', this is where other users are able to view all the Flowers the influencer has posted, as well choose to select specific Flowers. When an influencer adds to their garden, it does not automatically show to the public as it first has to get approved by admin before it shows on the public's (their follower's) homepage. The system stores all approved Petals and could reuse them as Rosebuds.

### 1.1.1 Terminology

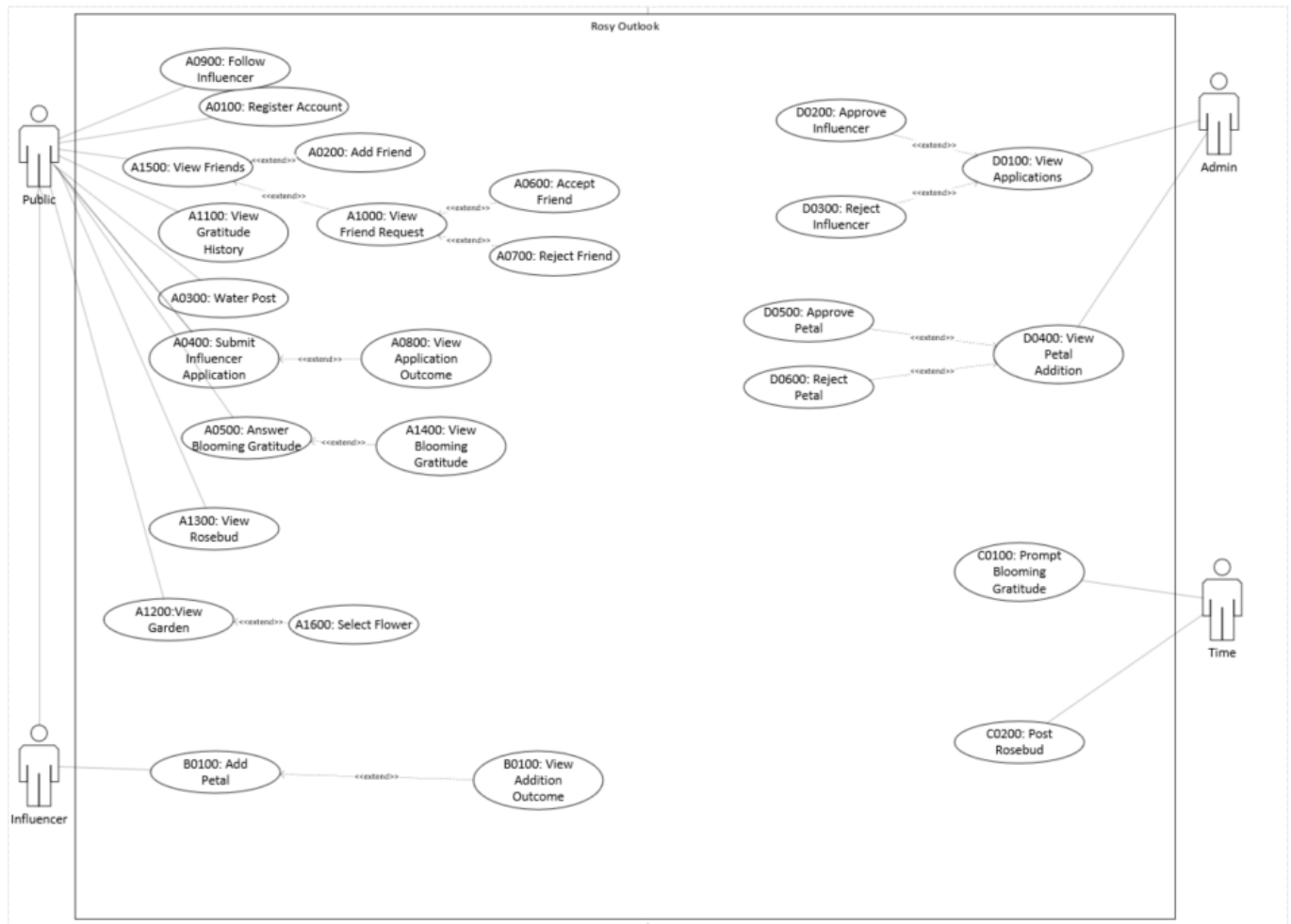
- **Rosebud:** The daily positive affirmation the system shares with the user.
- **Blooming Gratitude:** The daily prompt issued by the system for a user to share what they are grateful for or happy about on that day.
- **Garden:** The page of an influencer which contains everything they have posted.
- **Flower:** A category of posts that an influencer has in their Garden. For example, a Friendship Flower that consists of all the influencer's posts about friendship.
- **Petal:** The individual posts that make up a Flower i.e., belonging to a specific category, so Friendship Petals will make up a Friendship Flower.
- **Water:** The comment or reaction that a user leaves on a post, such as Rosebuds and Petals.

## 1.2 Project Assumptions

- An admin does not need to register an account as this is a built-in feature.

## 2 FUNCTIONAL REQUIREMENTS

### 2.1 Business Use Case Model



## 2.2 Use Case Glossary

| Package Name: Basics |                               |                    |
|----------------------|-------------------------------|--------------------|
| Use Case Id          | Use Case Name                 | Actors             |
| A0100                | Register Account              | Public             |
| A0200                | Add Friend                    | Public, Influencer |
| A0300                | Water Post                    | Public, Influencer |
| A0400                | Submit Influencer Application | Public             |
| A0500                | Answer Blooming Gratitude     | Public, Influencer |
| A0600                | Accept Friend                 | Public             |
| A0700                | Reject Friend                 | Public             |
| A0800                | View Application Outcome      | Public             |
| A0900                | Follow Influencer             | Public, Influencer |
| Queries/Reports      |                               |                    |
| A1000                | View Friend Request           | Public             |
| A1100                | View Gratitude History        | Public, Influencer |
| A1200                | View Garden                   | Public, Influencer |
| A1300                | View Rosebud                  | Public, Influencer |
| A1400                | View Blooming Gratitude       | Public, Influencer |
| A1500                | View Friend                   | Public, Influencer |
| A1600                | Select Flower                 | Public, Influencer |

| Package Name: Influencer |               |        |
|--------------------------|---------------|--------|
| Use Case Id              | Use Case Name | Actors |

|                        |                       |            |
|------------------------|-----------------------|------------|
| B0100                  | Add Petal             | Influencer |
| B0200                  | View Addition Outcome | Influencer |
| B0300                  |                       |            |
| B0400                  |                       |            |
| <b>Queries/Reports</b> |                       |            |
| B0600                  |                       |            |
| B0700                  |                       |            |

| Package Name: System Operations |                           |        |
|---------------------------------|---------------------------|--------|
| Use Case Id                     | Use Case Name             | Actors |
| C0100                           | Prompt Blooming Gratitude | Time   |
| C0200                           | Post Rosebud              | Time   |
| C0300                           |                           |        |
| C0400                           |                           |        |
| <b>Queries/Reports</b>          |                           |        |
| C0600                           |                           |        |
| C0700                           |                           |        |

| Package Name: Admin |                    |        |
|---------------------|--------------------|--------|
| Use Case Id         | Use Case Name      | Actors |
| D0100               | View Application   | Admin  |
| D0200               | Approve Influencer | Admin  |

|                        |                     |       |
|------------------------|---------------------|-------|
| D0300                  | Reject Influencer   | Admin |
| D0400                  | View Petal Addition | Admin |
| D0500                  | Approve Petal       | Admin |
| D0600                  | Reject Petal        | Admin |
| <b>Queries/Reports</b> |                     |       |
| D0700                  |                     |       |
| D0800                  |                     |       |

## 2.3 Use Case Narratives (User Stories)

### 2.3.1 Package A: Basics

| Use Case ID              | Use Case Name  |                            |
|--------------------------|--|----------------------------|
| A0100                    | Register Account   |                            |
| Primary Business Actors  |  | Other participating Actors |
| Public                   |  |                            |
| Description              | This use case describes the process of registering a new account on the system.  |                            |
| Pre-Conditions           | Public must not already have an existing account with the same details.  |                            |
| Triggers                 | Opening the application.   |                            |
| Post-Conditions          | Public will have registered an account.  |                            |
| Basic Flow of Events     | <ol style="list-style-type: none"> <li>1. System displays the Register Account page.</li> <li>2. User enters their desired username.</li> <li>3. System checks that there is no existing account with the same username.</li> <li>4. User enters their password twice.</li> <li>5. System checks that both passwords are exactly the same.</li> <li>6. User enters their email address.</li> <li>7. User clicks create account.</li> <li>8. System displays homepage.</li> </ol> |                            |
| Alternate Flow of Events | <ol style="list-style-type: none"> <li>3.1 Check fails, system displays error.</li> <li>3.2 Returns to step 2 in basic flow.</li> <li>5.1 Check fails, system displays error.</li> <li>5.2 Returns to step 4 in basic flow.</li> </ol>   |                            |

| Use Case ID              | Use Case Name  |                            |
|--------------------------|--|----------------------------|
| A0200                    | Add Friend   |                            |
| Primary Business Actors  |  | Other participating Actors |
| Public                   |  | Influencer                 |
| Description              | This use case describes the process of adding a new friend, or more specifically sending a friend request.   |                            |
| Pre-Conditions           | Public must have registered an account. Must be on the Friends tab of the Friends page.  |                            |
| Triggers                 | User would click on the search/add friend button.  |                            |
| Post-Conditions          | Friend request was sent.   |                            |
| Basic Flow of Events     | <ol style="list-style-type: none"> <li>1. User types in their friends username and hits the search button.</li> <li>2. User then selects friends account.</li> <li>3. User then click on Add friend button.</li> </ol> |                            |
| Alternate Flow of Events | <ol style="list-style-type: none"> <li>2.1 Account not found.</li> <li>2.2 Returns to step 1.</li> </ol>   |                            |

| Use Case ID             | Use Case Name   |                            |
|-------------------------|---|----------------------------|
| A0300                   | Water Post  |                            |
| Primary Business Actors |   | Other participating Actors |
| Public                  |   | Influencer                 |
| Description             | This use case describes the process of a user commenting on a post, such as a Petal, Rosebud or Blooming Gratitude. |                            |
| Pre-Conditions          | The user has to be viewing a post.  |                            |



|                      |   |
|----------------------|---|
| Triggers             | User clicks Water button.   |
| Post-Conditions      | The user will have left a comment on the post. This comment is then stored.   |
| Basic Flow of Events | <ol style="list-style-type: none"> <li>1. User types in their comment.</li> <li>2. User presses the post button.</li> <li>3. System displays their comment under the post.</li> </ol> |

| Use Case ID              | Use Case Name   |
|--------------------------|---|
| A0400                    | Submit Influencer Application   |
| Primary Business Actors  | Other participating Actors  |
| Public                   |   |
| Description              | A Public user would like to become an influencer and send an application to be an influencer.   |
| Pre-Conditions           | Public needs to already have a registered account.  |
| Triggers                 | Click the become influencer button.   |
| Post-Conditions          | An application to be an influencer has been submitted.  |
| Basic Flow of Events     | <ol style="list-style-type: none"> <li>1. User would have to answer a questionnaire.</li> <li>2. User clicks the submit button to Submit their application.</li> </ol>                        |
| Alternate Flow of Events | <ol style="list-style-type: none"> <li>2.1 System sees that not all required questions are answered.</li> <li>2.2 System displays an error message.</li> <li>2.3 Return to Step 1.</li> </ol> |

| Use Case ID             | Use Case Name   |
|-------------------------|---|
| A0500                   | Answer Blooming Gratitude   |
| Primary Business Actors | Other participating Actors  |
| Public                  | Influencer  |
| Description             | This use case describes the process of a user answering the prompt for what they are grateful for or happy about on that day.   |
| Pre-Conditions          | C0100 must have been invoked for the day (after 14:00)<br>The user must not have already answered Blooming Gratitude for that day.  |
| Triggers                | Clicking the Blooming Gratitude button.   |
| Post-Conditions         | The user will have posted what they are grateful for.   |
| Basic Flow of Events    | <ol style="list-style-type: none"> <li>1. System displays the prompt.</li> <li>2. User types in what they are grateful or happy for.</li> <li>3. User presses the post button.</li> </ol> |

| Use Case ID             | Use Case Name  |
|-------------------------|--|
| A0600                   | Accept Friend  |
| Primary Business Actors | Other participating Actors   |
| Public                  | Influencer   |
| Description             | Users will receive friend requests from other users, when they try to add them as a friend. User could then accept the friend request.                                       |
| Pre-Conditions          | User has a registered account and has a pending friend request.<br>Public has to be in the Friends tab of the Friends page, which is invoked by A1500.                       |
| Triggers                | User clicks on the View Friend Requests button, which is invoked by A1000.   |
| Post-Conditions         | A new friend was added.  |
| Basic Flow of Events    | <ol style="list-style-type: none"> <li>1. User would see their friend requests they have received.</li> <li>2. User could then select one of the friend requests.</li> </ol> |

|                          |  |
|--------------------------|--|
|                          | 3. User clicks the Add/ accept button.<br>4. User has now accepted and added a new friend. |
| Alternate Flow of Events | 3.1 User doesn't want to accept the request.<br>3.2 A0700 is invoked.                      |

| Use Case ID              | Use Case Name   |                            |
|--------------------------|---|----------------------------|
| A0700                    | Reject Friend   |                            |
| Primary Business Actors  |   | Other participating Actors |
| Public                   |   |                            |
| Description              | A User receives a friend request from someone they do not wish to add, so they reject the request.  |                            |
| Pre-Conditions           | User has a registered account and have a pending friend request. Public has to be in the Friends tab of the Friends page, which is invoked by A1500.  |                            |
| Triggers                 | User clicks on the view friend request button, which is invoked by A1000.   |                            |
| Post-Conditions          | User has denied the friend request.   |                            |
| Basic Flow of Events     | 1. User would see their friend requests they have received.<br>2. User could then select one of the friend requests.<br>3. User clicks the Deny/ reject button.<br>4. User has now accepted and added a new friend. |                            |
| Alternate Flow of Events | 3.1 User wants to accept the requests.<br>3.2 A0600 is invoked.   |                            |

| Use Case ID             | Use Case Name  |                            |
|-------------------------|--|----------------------------|
| A0800                   | View Application Outcome   |                            |
| Primary Business Actors |  | Other participating Actors |
| Public                  |  |                            |
| Description             | User checks to see if their influencer application is approved or denied.                              |                            |
| Pre-Conditions          | User would have had to applied to be an influencer.  |                            |
| Triggers                | User clicks on the become influencer button.   |                            |
| Post-Conditions         | User would have viewed the application outcome.  |                            |
| Basic Flow of Events    | 1. User would then click on the View Outcomes option.<br>2. The application outcome will be displayed. |                            |

| Use Case ID             | Use Case Name   |                            |
|-------------------------|---|----------------------------|
| A0900                   | Follow Influencer   |                            |
| Primary Business Actors |   | Other participating Actors |
| Public                  |   | Influencer                 |
| Description             | Follow a specific influencer to then have their flowers appear on your page.  |                            |
| Pre-Conditions          | User needs to have a registered account. Public has to be in the Following tab of the Friends page.   |                            |
| Triggers                | User would click on the search/add friend button.   |                            |
| Post-Conditions         | The User now follows the influencer.  |                            |
| Basic Flow of Events    | 1. User types in their influencers username and hits the search button.<br>2. User then selects influencer's account.<br>3. User then click on follow button.<br>4. User is now following the influencer. |                            |

|                          |   |
|--------------------------|---|
| Alternate Flow of Events | a. Influencer is not found.<br>b. Return to Step 1. |
|--------------------------|---|

| Use Case ID             | Use Case Name  |
|-------------------------|--|
| A1000                   | View Friend Request  |
| Primary Business Actors | Other participating Actors   |
| Public                  |  |
| Description             | This use case describes the process of viewing the friend requests that have been sent to a user.                                |
| Pre-Conditions          | Public has to be in the Friends section, which is invoked by A1500.  |
| Triggers                | Clicking the Friend Request tab.   |
| Post-Conditions         | The system displays the friend requests that were sent to that user.   |
| Basic Flow of Events    | 1. System displays a list of people that have sent friend requests to the user. There could also not be any new friend requests. |

| Use Case ID             | Use Case Name  |
|-------------------------|--|
| A1100                   | View Gratitude History   |
| Primary Business Actors | Other participating Actors   |
| Public                  | Influencer   |
| Description             | This use case describes the process of a user being able to view all the Blooming Gratitude posts that they have made. |
| Pre-Conditions          | User has answered at least one Blooming Gratitude (A0500).   |
| Triggers                | User clicks history button.  |
| Post-Conditions         | Every answer that the user has posted to Blooming Gratitude is displayed.  |
| Basic Flow of Events    | 1. The system displays the user's entire history of answers to Blooming Gratitude.                                     |

| Use Case ID             | Use Case Name   |
|-------------------------|---|
| A1200                   | View Garden   |
| Primary Business Actors | Other participating Actors  |
| Public                  | Influencer  |
| Description             | This use case describes the process of viewing the garden of an influencer.   |
| Pre-Conditions          | The user is viewing posts under their influencers section of the application, or they have clicked onto their following tab of the Friends section. |
| Triggers                | User clicks the Influencer's username.  |
| Post-Conditions         | The garden of a specific influencer will be displayed.  |
| Basic Flow of Events    | 1. The system displays the Garden of the selected influencer.<br>2. A1600 is invoked.   |

| Use Case ID             | Use Case Name              |
|-------------------------|----------------------------|
| A1300                   | View Rosebud               |
| Primary Business Actors | Other participating Actors |
| Public                  | Influencer                 |

|                             |  |
|-----------------------------|--|
| <b>Description</b>          | This use case describes the process of viewing the Rosebud that was sent by the system in C0200. |
| <b>Pre-Conditions</b>       | A new Rosebud has been posted to the users' homepage, invoked by C0200.                          |
| <b>Triggers</b>             | User clicks Rosebud button.  |
| <b>Post-Conditions</b>      | The user can view the new Rosebud for the day.   |
| <b>Basic Flow of Events</b> | 1. System displays the Rosebud.  |

| Use Case ID                 | Use Case Name  |                            |
|-----------------------------|--|----------------------------|
| A1400                       | View Blooming Gratitude  |                            |
| Primary Business Actors     |  | Other participating Actors |
| Public                      |  | Influencer                 |
| <b>Description</b>          | This use case describes the process of viewing the Blooming Gratitude posted by all the user's friends or influencers they are following.. |                            |
| <b>Pre-Conditions</b>       | The user must have already answered Blooming Gratitude for that day (A0500).   |                            |
| <b>Triggers</b>             | User clicks the Friends or Following tab on their homepage.  |                            |
| <b>Post-Conditions</b>      | The user can view the Blooming Gratitude answers.  |                            |
| <b>Basic Flow of Events</b> | 1. The system displays the Blooming Gratitude answers of either the user's friends or those they follow.                                   |                            |

| Use Case ID                 | Use Case Name   |                            |
|-----------------------------|---|----------------------------|
| A1500                       | View Friend   |                            |
| Primary Business Actors     |   | Other participating Actors |
| Public                      |   | Influencer                 |
| <b>Description</b>          | This use case describes the process of viewing the Friends section. |                            |
| <b>Pre-Conditions</b>       | User must have an account.  |                            |
| <b>Triggers</b>             | User clicks Friends button.   |                            |
| <b>Post-Conditions</b>      | User's friends are displayed.                                       |                            |
| <b>Basic Flow of Events</b> | 1. The system displays the friends of the user.                     |                            |

| Use Case ID                 | Use Case Name   |                            |
|-----------------------------|---|----------------------------|
| A1600                       | Select Flower   |                            |
| Primary Business Actors     |   | Other participating Actors |
| User                        |   | Influencer                 |
| <b>Description</b>          | The user would go onto an influencers page and select the flower the user would like to view.   |                            |
| <b>Pre-Conditions</b>       | User must have a registered account.  |                            |
| <b>Triggers</b>             | User is viewing an influencer's Garden invoked by A1200.  |                            |
| <b>Post-Conditions</b>      | Viewing the petals in the Influencers flower.   |                            |
| <b>Basic Flow of Events</b> | 1. Systems displays which flowers are available in the specific influencer's Garden.<br>2. User would select a flower to view.<br>3. User would click on the flower. (User clicks apply filter) |                            |

|  |   |
|--|---|
|  | 4. User would now be able to view all the petals within the flower. |
|--|---|

### 2.3.2 Package B: Influencer

| Use Case ID             | Use Case Name  |                            |
|-------------------------|--|----------------------------|
| B0100                   | Add Petal  |                            |
| Primary Business Actors |  | Other participating Actors |
| Influencer              |  |                            |
| Description             | The influencer wants to add a new flower to their garden. They add what they would like to post, and it gets sent to the admins to get it reviewed(D0400). |                            |
| Pre-Conditions          | User needs to be an influencer.<br>Influencer needs to be on their homepage.   |                            |
| Triggers                | Influencer clicks the post button to add a flower.   |                            |
| Post-Conditions         | Influencer has potentially added flower.   |                            |
| Basic Flow of Events    | <ol style="list-style-type: none"> <li>1. User adds what they would like to post.</li> <li>2. User clicks the post button.</li> </ol>                      |                            |

| Use Case ID             | Use Case Name   |                            |
|-------------------------|---|----------------------------|
| B0200                   | View Addition Outcome   |                            |
| Primary Business Actors |   | Other participating Actors |
| Influencer              |   |                            |
| Description             | Influencers would like to see if their new petal is approved(D0500) or not(D0600).  |                            |
| Pre-Conditions          | Influencer needed to submit a petal for review, invoked by B0100.<br>Influencer needs to be on their homepage.  |                            |
| Triggers                | Clicking the post button.   |                            |
| Post-Conditions         | Knowing the status of the petal.  |                            |
| Basic Flow of Events    | <ol style="list-style-type: none"> <li>1. Select the option to view petal addition outcome.</li> <li>2. System displays the outcome of the petal addition.</li> </ol> |                            |

### 2.3.3 Package C: System Operations

| Use Case ID             | Use Case Name  |                            |
|-------------------------|--|----------------------------|
| C0100                   | Prompt Blooming Gratitude  |                            |
| Primary Business Actors |  | Other participating Actors |
| Time                    |  |                            |
| Description             | This use case describes the process of the system prompting the user to answer Blooming Gratitude.   |                            |
| Pre-Conditions          | At least one account has been registered.  |                            |
| Triggers                | This occurs automatically at 14:00.  |                            |
| Post-Conditions         | A new Blooming Gratitude prompt will be available to users to answer.  |                            |
| Basic Flow of Events    | <ol style="list-style-type: none"> <li>1. The system sends the Blooming Gratitude prompt to users, and it now appears on their home page.</li> </ol> |                            |

| Use Case ID | Use Case Name |  |
|-------------|---------------|--|
| C0200       | Post Rosebud  |  |

| Primary Business Actors |  | Other participating Actors |
|-------------------------|--|----------------------------|
| Time                    |  |                            |
| Description             | This use case describes the process of the system posting a Rosebud.                             |                            |
| Pre-Conditions          | At least one account has been registered.<br>There is at least one Rosebud stored in the system. |                            |
| Triggers                | This occurs automatically at 00:00.  |                            |
| Post-Conditions         | A new Rosebud will be available for users to view.   |                            |
| Basic Flow of Events    | 1. The system sends the Rosebud to users.  |                            |

### 2.3.4 Package D: Admin

| Use Case ID             | Use Case Name  |                            |
|-------------------------|--|----------------------------|
| D0100                   | View Application   |                            |
| Primary Business Actors |  | Other participating Actors |
| Admin                   |  |                            |
| Description             | This use case describes the process of viewing all the current influencer applications that have been submitted (A0400). |                            |
| Pre-Conditions          | User has to be on an admin account.  |                            |
| Triggers                | Admin clicks View Application button.  |                            |
| Post-Conditions         | A list of unprocessed influencer applications is displayed.  |                            |
| Basic Flow of Events    | 1. The system displays all the influencer applications.  |                            |

| Use Case ID              | Use Case Name   |                            |
|--------------------------|---|----------------------------|
| D0200                    | Approve Influencer  |                            |
| Primary Business Actors  |   | Other participating Actors |
| Admin                    |   |                            |
| Description              | Admin makes a regular user a new influencer.  |                            |
| Pre-Conditions           | A user submitted an application to be an influencer.  |                            |
| Triggers                 | The admin views the influencer applications, D0100 is invoked.  |                            |
| Post-Conditions          | There is now a new influencer.  |                            |
| Basic Flow of Events     | 1. Admin will review the application.<br>2. Admin is happy with the application.<br>3. Admin approves the influencer. |                            |
| Alternate Flow of Events | 2.1 Admin is unhappy with the application.<br>2.2 D0300 is invoked.   |                            |

| Use Case ID             | Use Case Name  |                            |
|-------------------------|--|----------------------------|
| D0300                   | Reject Influencer  |                            |
| Primary Business Actors |  | Other participating Actors |
| Admin                   |  |                            |
| Description             | Admin denies a regular user becoming a new influencer.         |                            |
| Pre-Conditions          | A user submitted an application to be an influencer.           |                            |
| Triggers                | The admin views the influencer applications, D0100 is invoked. |                            |

|                                 |  |
|---------------------------------|--|
| <b>Post-Conditions</b>          | Influencer application is rejected.  |
| <b>Basic Flow of Events</b>     | <ol style="list-style-type: none"> <li>1. Admin would review the application.</li> <li>2. Admin is not happy with the application.</li> <li>3. Admin rejects the application.</li> </ol> |
| <b>Alternate Flow of Events</b> | <ol style="list-style-type: none"> <li>2.1 Admin is happy with the application.</li> <li>2.2 D0200 is invoked.</li> </ol>  |

| Use Case ID                 | Use Case Name  |
|-----------------------------|--|
| D0400                       | View Petal Addition  |
| Primary Business Actors     | Other participating Actors   |
| Admin                       |  |
| <b>Description</b>          | This use case describes the process of viewing all the pending petal additions that have been submitted by influencers (B0100).    |
| <b>Pre-Conditions</b>       | User has to be on an admin account.  |
| <b>Triggers</b>             | Admin clicks View Petal Addition button.   |
| <b>Post-Conditions</b>      | A list of unprocessed Petal Additions is displayed.  |
| <b>Basic Flow of Events</b> | <ol style="list-style-type: none"> <li>1. The system displays all the Petal Additions that admin needs to approve/deny.</li> </ol> |

| Use Case ID                     | Use Case Name   |
|---------------------------------|---|
| D0500                           | Approve Petal   |
| Primary Business Actors         | Other participating Actors  |
| Admin                           |   |
| <b>Description</b>              | The admin accept/ adds the new petal's addition to the influencers garden.  |
| <b>Pre-Conditions</b>           | Influencer has uploaded a petal that's waiting for approval or to be denied.  |
| <b>Triggers</b>                 | Admin views the Garden Additions, D0400 is invoked.   |
| <b>Post-Conditions</b>          | Influencer has a new petal in their garden.   |
| <b>Basic Flow of Events</b>     | <ol style="list-style-type: none"> <li>1. Admin would have to select a specific Petal.</li> <li>2. Admin reviews the Petal.</li> <li>3. Admin is happy with the Petal.</li> <li>4. Admin accepts the Petal.</li> <li>5. Petal gets added to influencer's garden.</li> </ol> |
| <b>Alternate Flow of Events</b> | <ol style="list-style-type: none"> <li>3.1 Admin is unhappy with the Petal.</li> <li>3.2 D0600 is invoked.</li> </ol>   |

| Use Case ID                 | Use Case Name  |
|-----------------------------|--|
| D0600                       | Reject Petal   |
| Primary Business Actors     | Other participating Actors   |
| Admin                       |  |
| <b>Description</b>          | The admin denies the new petal's addition to the influencers garden.   |
| <b>Pre-Conditions</b>       | Influencer has uploaded a petal that's waiting for approval or to be denied.   |
| <b>Triggers</b>             | Admin views the Garden Additions, D0400 is invoked.  |
| <b>Post-Conditions</b>      | New flower is not added to the Garden.   |
| <b>Basic Flow of Events</b> | <ol style="list-style-type: none"> <li>1. Admin would have to select a specific Petal.</li> <li>2. Admin reviews the Petal addition.</li> <li>3. Admin is unhappy with the Petal.</li> </ol> |

|                          |  |
|--------------------------|--|
|                          | 4. Admin rejects the addition.                                 |
| Alternate Flow of Events | 3.1 Admin is happy with the addition.<br>3.2 D0500 is invoked. |



## 3 NON-FUNCTIONAL REQUIREMENTS

---

### 3.1 Interface Requirements

The Rosey Outlook application will be implemented in the form of a mobile application. We aim to have a simple minimalistic design that is easy to navigate, which will ensure consistency in both the design and colour. This style will ensure that the application is simplistic, clean and minimalistic look and feel.

#### 3.1.1 Usability Goals

The system's goal is to be an effective way for users to gain some much-needed positivity, to alleviate the stress of everyday life.

Navigation within the app should be easy, considering the application would only have 3 screens, that would have different functionality, which would all be clearly labeled, for novice users, there wouldn't be any type of shortcuts for experienced users, as it is such a basic application. The user could be literally anyone looking for positive reinforcement with a smart phone that meets the minimum requirements for the application. Since the system has everything clearly labeled it would be easy to learn how to use, as well as it being similar to most social medias it wouldn't be much of an adjustment to anyone who frequents social media.

The main screen when open the application would be the home page, where they can view their friends Blooming Gratitude. It would operate the same as any other social media, where the user would just need to scroll on the page.

#### 3.1.2 User Experience

Rosey Outlook aims to be similar to all modern-day social media applications, by having a simple aesthetically pleasing design. We aim for the app to have a positive effect on the user's life, whether that be giving them the motivation they lack and a reason that drives them to achieve their goals or simply just bringing a smile to their face.

#### 3.1.3 User Requirements

This being a simple mobile app, we aim to make it similar to other social media applications, which users are currently familiar with so users wouldn't need any new skills to make use of it and everyone from novice users to experienced users wouldn't have difficulty using it as there shouldn't be any complicated aspects to using it. The app would be clearly labeled for new or in-experienced user, and after continuous use it would be easier than it initially was to navigate the app.

### 3.2 Performance Requirements

It is critical that the application is responsive and transitions between the pages effortlessly. Any sort of lag or continuous loading between the pages will negatively affect the users experience and in turn would give the application negative reviews. Thus, we will ensure the app is hosted on a reliable and accessible server.

All the tasks done by the system need to be done in the shortest time possible while also ensuring the results are accurate and presented appropriately. Users will receive a Rosebud at midnight everyday as well as a prompt for Blooming Gratitude daily and it is the system's responsibility to distribute these on time.

Since users also interact with others the system should continuously refresh to display new content to users. This new content may be Petals from Influencers or Blooming Gratitude from Friends.

### 3.3 Security Requirements

This being a social media application, there would be some personal information of the user stored in the app, so it is of utmost importance to prevent unauthorized viewing and tampering of private data and ensure data integrity is kept intact. The system would have the following security measures in place to ensure certain privileges are awarded to specific groups and certain information is kept secret to specific users:

- All user accounts are password protected
- Only the user would be able to view their previous Blooming Gratitude
- Users would only be able to view Blooming Gratitude's of friends they have added on the app, as well as only see Petals of influencers they follow
- Admins flag suspicious activity on accounts

### **3.4 Operational Requirements**

The system will be developed to run on mobile devices running an android operating system with API 21 (Android 5.0) or higher. The device will require network capabilities. The system will be in the form of a mobile application developed using Android studio, along with, the use of, various other libraries. The system will make use of either SQL Light, DB browser or mySQL to store data for its users.

## 4 DATA REQUIREMENTS

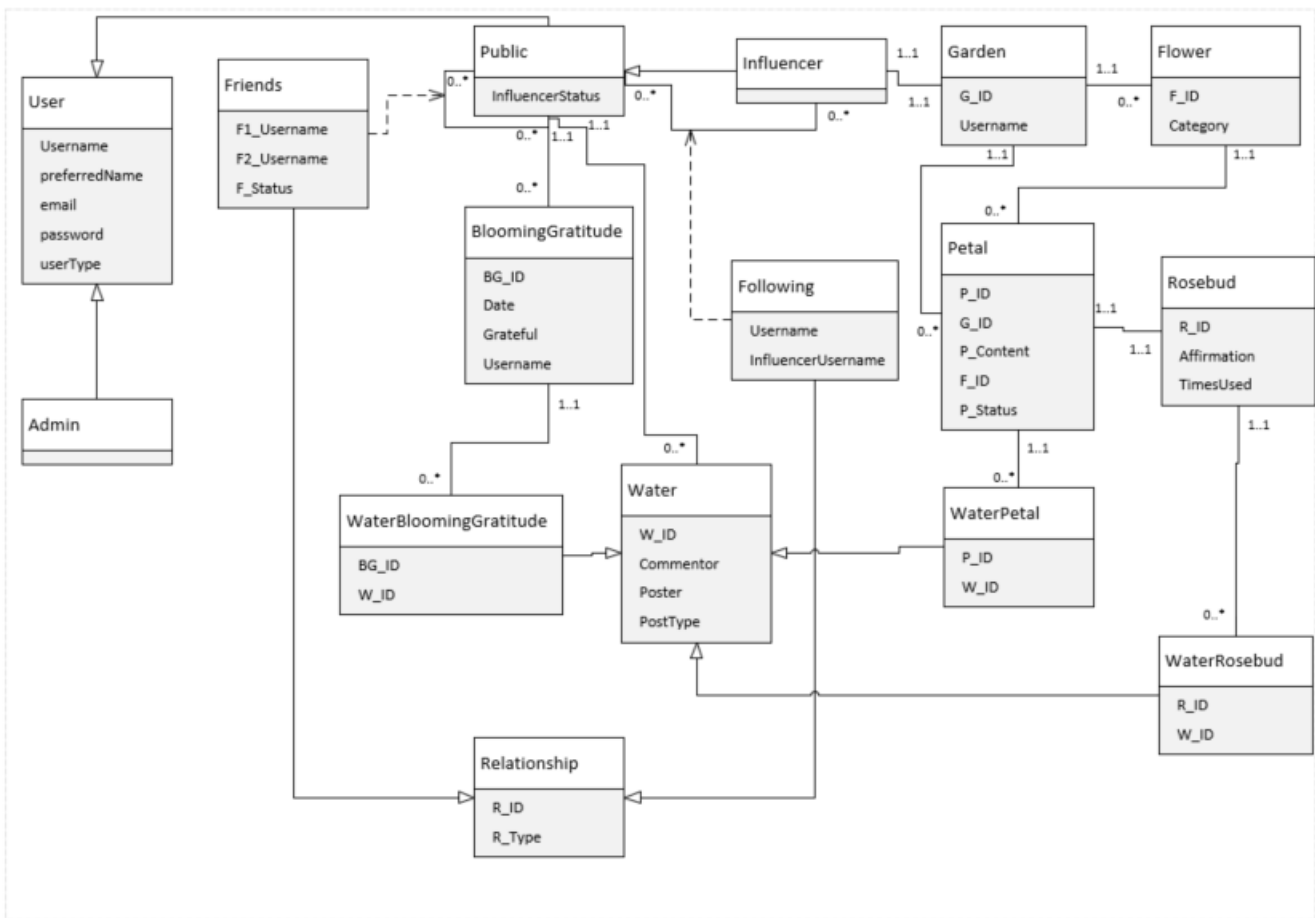
### 4.1 Preliminary List of data and attributes

| Entity                 | Entity Attributes   |
|------------------------|---|
| User                   | <b>Username</b> , preferredName, email, password, UserType    |
| Rosebud                | <b>R_ID</b> , Affirmation, TimesUsed                          |
| Blooming Gratitude     | <b>BG_ID</b> , Date, Grateful, <i>Username</i>                |
| Petal                  | <b>P_ID</b> , <i>G_ID</i> , P_Content, <i>F_ID</i> , P_Status |
| Garden                 | <b>G_ID</b> , <i>Username</i>                                 |
| Water                  | <b>W_ID</b> , <i>Commentor</i> , <i>Poster</i> , PostType     |
| Flower                 | <b>F_ID</b> , Category  |
| Influencer             |   |
| Friends                | <b>F1_Username</b> , <b>F2_Username</b> , F_Status            |
| Following              | <b>Username</b> , <b>InfluencerUsername</b>                   |
| Public                 | InfluencerStatus  |
| Admin                  |   |
| WaterBloomingGratitude | <b>BG_ID</b> , <b>W_ID</b>                                    |
| WaterRosebud           | <b>R_ID</b> , <b>W_ID</b>                                     |
| WaterPetal             | <b>P_ID</b> , <b>W_ID</b>                                     |
| Relationship           | <b>R_ID</b> , R_Type  |

#### Notes:

- Rosebuds and Petals are independent of each other regarding watering, so if someone waters a Rosebud, this is not reflected on the original Petal that the Rosebud comes from and if someone waters a Petal that is later posted as a Rosebud, these comments are not reflected on the Rosebud.
- The status such as in P\_Status, F\_Status, and InfluencerStatus, shows the status of an application or request. So the value would either be pending, accepted or rejected. In the case of influencer status in the Public entity, this value would be null if the user has not applied to be an influencer.
- After a certain amount of time, all the rows that have a status of "Reject" will be deleted from the table. This is only stored long enough for the user to be able to view the outcome.
- Once a Petal has the status "Accept", it is added to the Rosebud table.
- If a user has not answered Blooming Gratitude in a while, they will only be able to view the last Blooming Gratitude of their friends that was available to them for 48 hours, after that there will not be any Blooming Gratitude of Friends displayed until the user has posted a new Blooming Gratitude.

## 4.2 Domain Class Diagram



## 5 Preliminary Schedule of Responsibilities

| Use Case ID & Name   | Team Member Responsible |                          |
|--|-------------------------|--------------------------|
|  | Student Number          | Name                     |
| <ul style="list-style-type: none"> <li>• A0100 Register Account</li> <li>• A0300 Water Post</li> <li>• A0400 Submit Influencer Application</li> <li>• A0500 Answer Blooming Gratitude</li> <li>• A0800 View Application Outcome</li> <li>• A1100 View Gratitude History</li> <li>• A1200 View Garden</li> <li>• A1300 View Rosebud</li> <li>• A1400 View Blooming Gratitude</li> <li>• A1500 View Friend</li> <li>• A1600 Select Flower</li> <li>• B0100 Add Petal</li> <li>• B0200 View Addition Outcome</li> </ul> | <b>224078321</b>        | <b>Ganeefa Sirkhotte</b> |
| <ul style="list-style-type: none"> <li>• A0200 Add Friend</li> <li>• A0600 Accept Friend</li> <li>• A0700 Reject Friend</li> <li>• A0900 Follow Influencer</li> <li>• A1000 View Friend Request</li> <li>• C0100 Prompt Blooming Gratitude</li> </ul>  | <b>223126756</b>        | <b>Junaid Brooks</b>     |

|  |  |  |
|--|--|--|
| <ul style="list-style-type: none"><li>• C0200 Post Rosebud</li><li>• D0100 View Application</li><li>• D0200 Approve Influencer</li><li>• D0300 Reject Influencer</li><li>• D0400 View Petal Addition</li><li>• D0500 Approve Petal</li><li>• D0600 Reject Flower</li></ul> |  |  |
|--|--|--|

## 6 Researching the Requirements

---

### 10 User Interview Questions

1. What user details need to be stored?
2. Should there be predetermined flower categories to choose between?
3. Are you happy with only you being able to see your own Blooming Gratitude history, or would you like others to be able to view it too/would you like to view others' history?
4. As an influencer, if your Petal gets reused as a Rosebud, would you like the Rosebud to include your username so that other users can see who originally posted it?
5. How long would you like the outcome of an application or request to be available to you?
6. What is something you wish you were told? (What is something you needed to hear today?)
7. What should be done with inactive accounts?
8. What features, from other social media mobile applications, would you like to see incorporated in this application?
9. What topic of positive content would you like to see?
10. Have you ever had any negative experiences with other social media applications? If yes, could you elaborate.

**Department of Computing Sciences  
Faculty of Science**

**DECLARATION OF ACADEMIC INTEGRITY**

- We are aware of the Nelson Mandela University policy regarding the Promotion of Academic Integrity and Prevention of Plagiarism.
- We understand what plagiarism is and we know that it constitutes unacceptable academic behaviour.
- We declare that the work that we are submitting herewith is our own work.
- We have not allowed, and will not allow, anyone to copy our work with the intention of passing it off as their own work.

**STUDENT FULL NAME:** Junaid Brooks

**STUDENT NUMBER:** 223126756



**SIGNATURE:** \_\_\_\_\_

**STUDENT FULL NAME:** Ganeefa Sirkhotte

**STUDENT NUMBER:** 224078321



**SIGNATURE:** \_\_\_\_\_