

Final-Term Project Native Mobile Programming **CERBUNG**

Gasal 2023-2024
1604C044

Introduction

In the bustling world of Cerbung (Cerita Bersambung), storytellers unite to craft tales that seamlessly intertwine. With each paragraph, a new voice joins the creative symphony, adding depth, intrigue, and unexpected twists to the unfolding narrative. Together, they embark on a collaborative journey, weaving a tapestry of imagination that knows no bounds.

The Cerbung application comprises several pages, namely Home, Cerbung Details, Create Cerbung, Users, Notifications, Following, and Preferences. Here are the explanations for each page:

Home

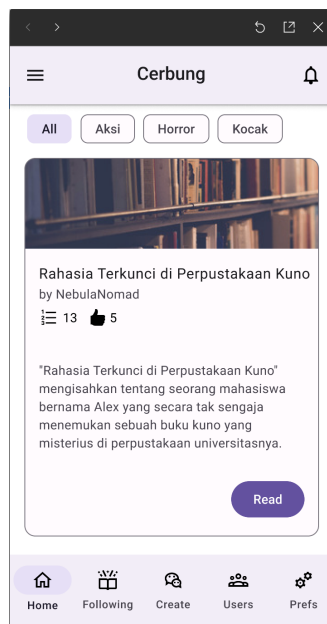


Figure 1. Cerbung Home

The Home page showcases the Cerbungs with the most likes. Each Cerbung features an image, a brief description, the number of likes, and the number of paragraphs. A "Read" button allows storytellers to access more details about the Cerbung and dive into its storyline. Furthermore, on the Home page, storytellers can search for Cerbungs based on specific genre criteria and keywords, enhancing their ability to discover stories tailored to their interests.

Figma link:

<https://www.figma.com/proto/MbPvn4T1BnFdHYjMjdZI2V/Untitled?type=design&node-id=1-6&t=zN8Y9qmmlUpHkvMi-1&scaling=scale-down&page-id=0%3A1&starting-point-node-id=1%3A6&show-proto-sidebar=1&mode=design>

Cerbung Details (Read Cerbung)

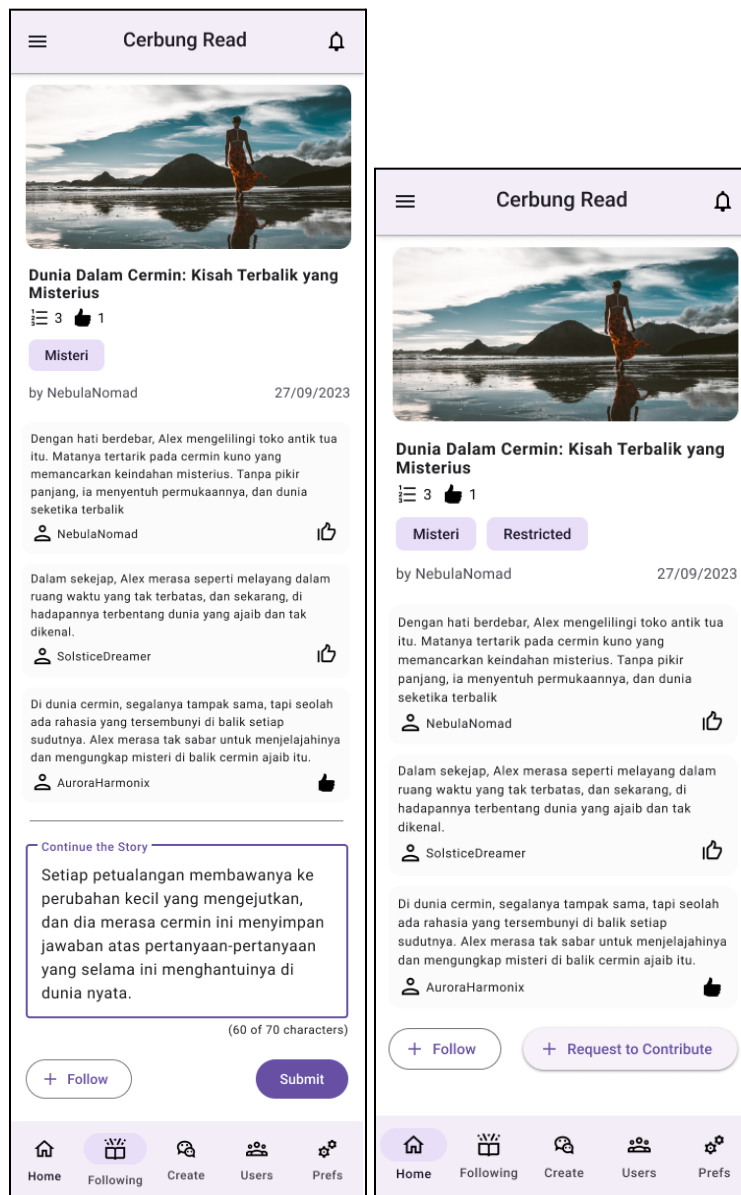


Figure 2. Left: Public Cerbung; Right: Restricted Cerbung

The Cerbung Details page unveils the evolving story. Storytellers can peruse paragraphs crafted by fellow contributors. If a Cerbung is set to public, storytellers can seamlessly add new paragraphs to further the existing narrative. However, for restricted Cerbungs, storytellers have the option to request access to contribute. Additionally, there's a "Follow" button that allows storytellers to add the Cerbung to their list of favorites (with a dedicated page to access their followed Cerbungs), ensuring they never miss a captivating storyline.

Create Cerbung

The figure displays three sequential screens of a 'Create Cerbung' wizard. Each screen has a purple header with a hamburger menu icon, the title 'Create Cerbung', and a notification bell icon. A bottom navigation bar is consistent across all screens, featuring icons for Home, Following, Create (active), Users, and Prefs.

- Step 1:** The user enters the Cerbung Title ('Dunia Dalam Cermin: Kisah Terbalik yan'), a Short Description ('kisah seru tentang seorang anak yang menemukan cermin ajaib di sebuah toko antik. Saat ia melihat ke dalam cermin, ia terseret ke dunia yang seakan terbalik, di mana segalanya'), a Cerbung Image Cover URL ('Insert valid image url here'), and chooses a Genre ('Misteri'). It shows '1 of 3' and a 'Next' button.
- Step 2:** The user selects access rights ('Restricted' is chosen, with 'Public' as an option) and writes the first paragraph ('Dengan hati berdebar, Alex mengelilingi toko antik tua itu. Matanya tertarik pada cermin kuno yang memancarkan keindahan misterius. Tanpa pikir panjang, ia'). It shows '2 of 3', 'Prev', and 'Next' buttons.
- Step 3:** The user confirms the Cerbung data. The title is 'Dunia Dalam Cermin: Kisah Terbalik yang Misterius'. There are buttons for 'Misteri' and 'Restricted'. A preview of the story text is shown. A checkbox 'I agree with the rules and policies in creating Cerbung...' is checked. It shows 'Prev', 'Publish This Cerbung', and 'Next' buttons.

Figure 3. Three steps to Create a New Cerbung

On the "create new cerbung" page, the user is asked to fill out a wizard that consists of three steps. In the first step, the user enters the details of the cerbung being created, including the title, a brief description, the URL of the cerbung's Figure, and the cerbung category. Moving on to the second step, the user specifies the access rights for this cerbung and writes its first paragraph. The final step is to confirm the cerbung data. If the user feels that the inputted data is correct, they can then publish their cerbung.

Users

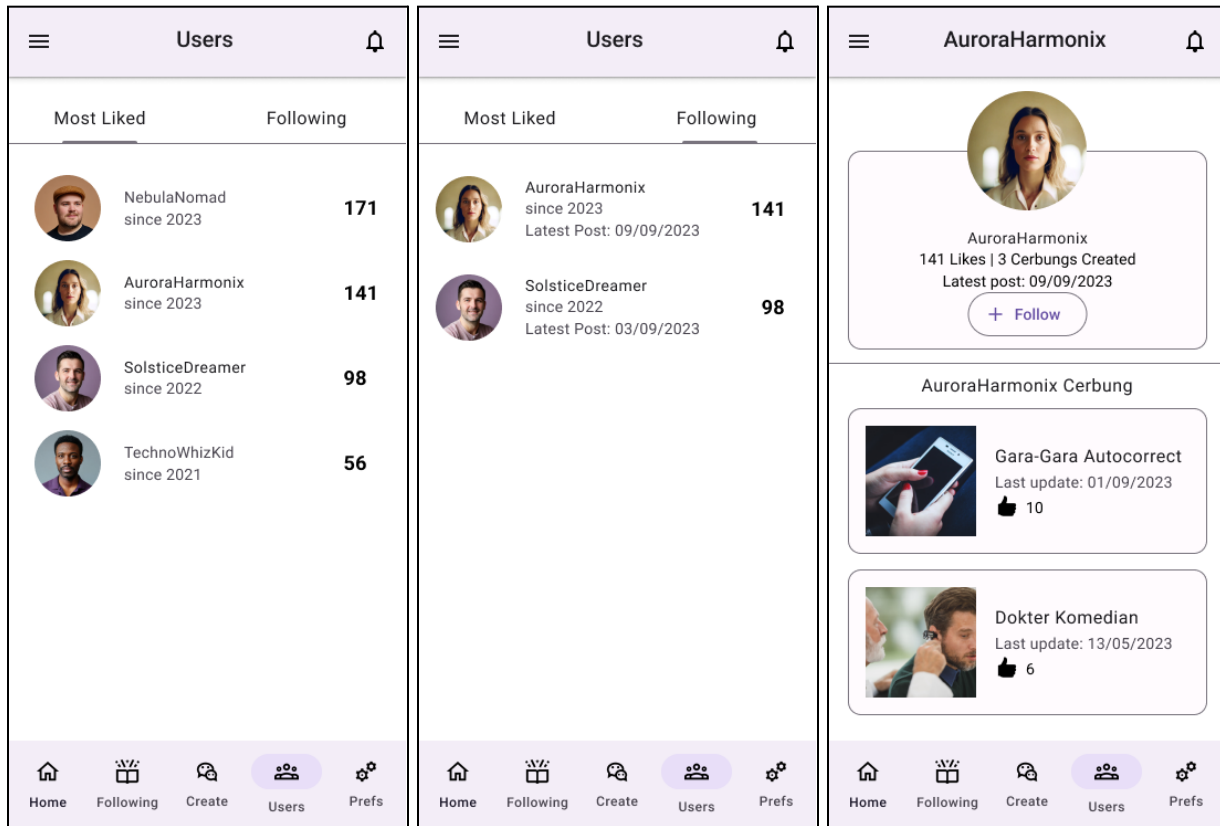


Figure 4. Left: Most Liked tab; Center: Following Tab; Right: Selected User Profile

The users' page has two tabs. The first tab displays users with the most likes on their cerbung. They are sorted by the total number of likes they have received. You can view a user's profile by tapping on their profile picture or selected username. The user's profile page displays information including their profile picture, total number of likes, number of cerbung they have created, the date of their last post, and a list of the cerbung they have created. On this profile page, if you are interested in this user, you can follow them by clicking the follow tab. Subsequently, all the users you follow will appear in the second tab.

Following

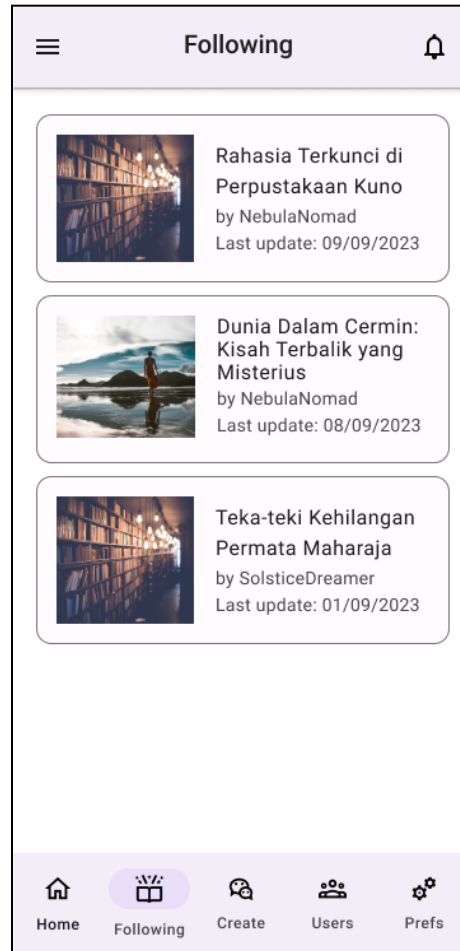


Figure 5. The “Following” page that shows user followed Cerbung

The "Following" page displays the cerbungs that are followed by the user. The user can tap on a cerbung to read its continuation. In other words, the cerbungs shown on the "Following" page are sorted based on the latest postings/updates.

Notifications

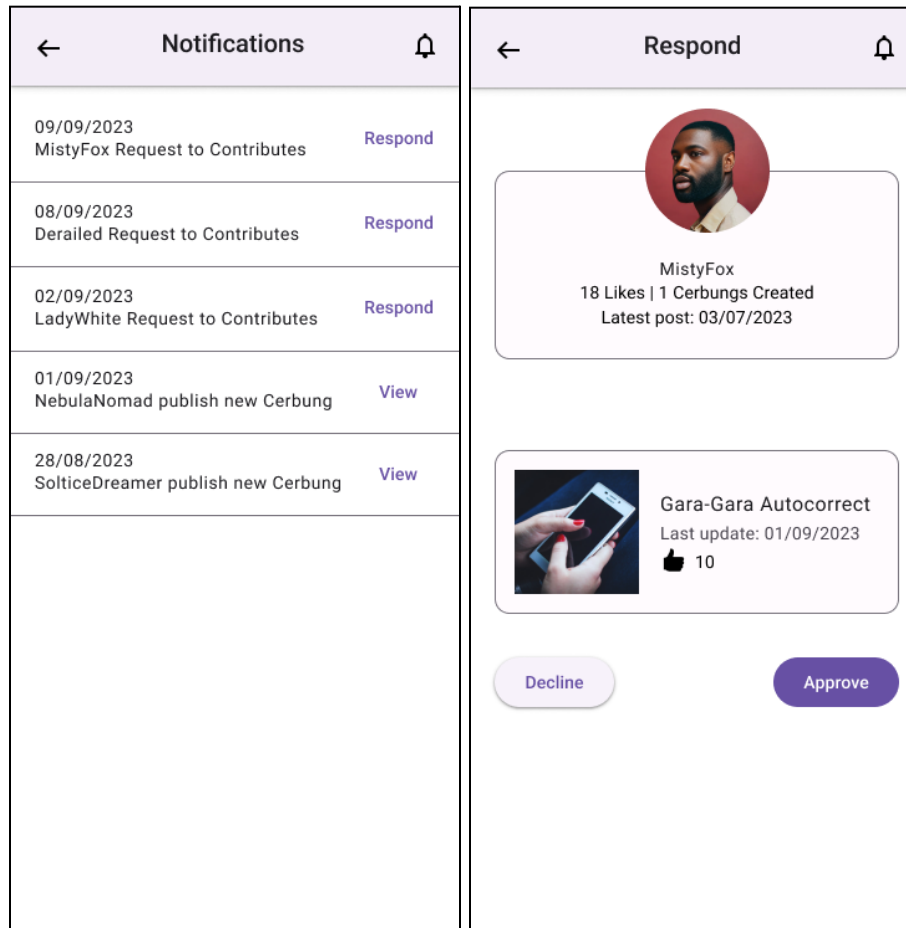


Figure 6. The Notification and Respond page

The notification page shows two types of notifications: request notifications for contributing to Cerbung with restricted access and notifications when a followed user publishes a new Cerbung. You can respond to contribution requests by simply pressing the response button. When you do this, the "Respond" page appears, displaying the requester's profile and the Cerbung in question. You can then choose to approve or reject the contribution request. As for new Cerbung notifications, you can view the Cerbung directly by clicking the "view" button.

Preferences

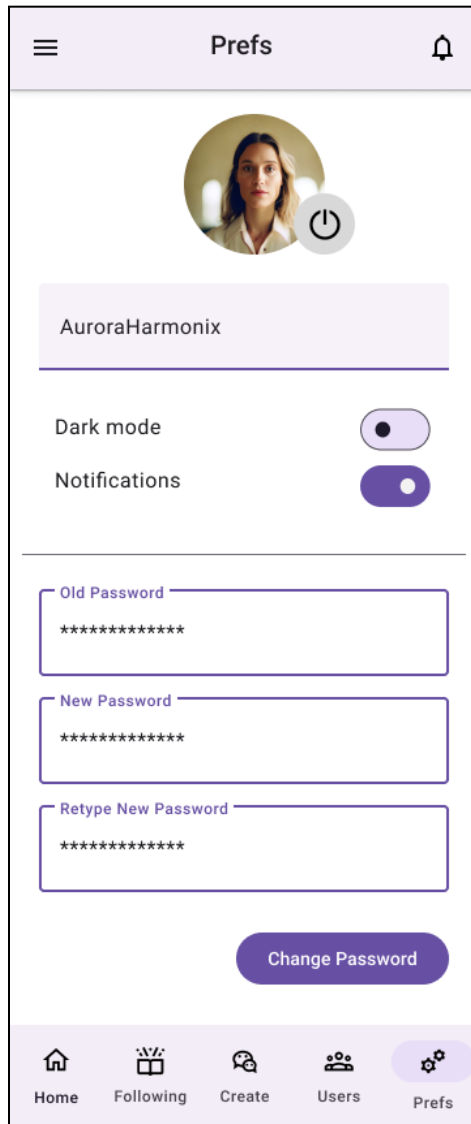


Figure 7. Preferences page

On the preferences page, users can change their password, switch to a dark theme, turn off notifications, and log out of the application. To change the password, simply enter the old password, then the new password, and confirm the new password. Please note that the username cannot be changed.

Final-Term Project Details

Please take a look at the following table, which outlines the tasks that need to be completed. Pay close attention to the instructions and assessment criteria to ensure that your group achieves the highest possible score.

No	Components	Notes	Requirements	Grades (max)
1	Sign in, Sign Up, Sign Out		User can sign in successfully.	5%
	Implement the sign-up, sign-in, and sign-out processes. Use the UI from the mid-term project. Retrieve all data from the REST API, and ensure that all data is stored on the server.		Page redirects to home Prevent back button after login	
2	Home		Use webservice to display the Cerbung data	10%
	The home page displays a RecyclerView containing a minimum of three Cerbung data entries. The Cerbung data is presented in the form of a card view (refer to the previous Figma screenshot). This data is retrieved through REST API web services, and all Cerbung data should be stored on the server.		Use recycler view Use card view Navigate to Read Cerbung page	
3	Bottom Navigation		User can navigate the app through Bottom Navigation Bar	5
	Bottom Navigation contains 5 destinations: Home, Following, Create, Users, and Prefs. You may implement ViewPager and Fragments as well, or just use Intent and Activity, which are sufficient			
4	Read Cerbung		Read intent object	30%
	The "Read Cerbung" page displays cerbung data that is sent via an intent from the home page. You can refer to the appearance of the "Read Cerbung" page in the		Load Cerbung by id as parameter for web services	

	<p>previous Figma screenshot. The only data that can be sent via the intent is the "id" of the cerbung. Use this "id" to retrieve the specific Cerbung from the web service.</p> <p>Several interactions within the "Read Cerbung" page are as follows:</p> <ul style="list-style-type: none"> • Users can press the like button for Cerbung and/or for each paragraph written by other users. All likes should be stored in the database server. • Users can follow a Cerbung. All followed Cerbung should be appeared in "Following" menu • Limit the character number that users are able to post when writing the paragraph. • If the Cerbung is restricted, show a "Request to Contribute" button. • If the Cerbung is not restricted, show a text field that indicates the user can continue and submit the story (paragraph). 	Data loaded and displayed correctly	
5	Create Cerbung	Navigate between Create Cerbung wizard through intent	20%
	<p>The "Create Cerbung" page consists of three sections. Please refer to the previous Figma reference. Each section represents a distinct activity. To navigate to each section, use the provided intents. Users can save the new Cerbung using the web service, and the data is stored on the server.</p>	<p>Use proper read and put intent object</p> <p>Using web service to stored the Cerbung</p>	
6	Prefs	User can change password	5
	<p>Implement a mechanism for changing passwords, a sign-out button, the ability to enable/disable dark mode, and the option to enable/disable in-app notifications.</p>	<p>User can sign out</p> <p>User can switch from light to dark mode</p>	
7	Following	User can look all the followed	5
	The following page displays all followed Cerbung. Use a		

	recycler view and cards to display Cerbung data. All data should be retrieved through a REST API.	Cerbung. Navigate to “Read Cerbung” page	
8	Users (Additional Features)		
	<p>The "User" page displays all the users. It shows the user's avatar image, username, date joined, and the total accumulated number of likes from their Cerbungs. When user data is clicked, the page redirects to display the user's data in more detail. The detailed information includes the user's avatar, username, total likes, number of Cerbungs created, latest post date, and Cerbungs data created by this user.</p> <p>Note: There is no need to implement the following tabs, and users cannot follow other users.</p>	<p>Display all users data</p> <p>Navigate to “User” details</p>	10
9	Notifications (Additional Features)		
	<p>The 'Notification' page is accessible through the top bar menu. It displays all the notifications from the following actions: Another user has requested to contribute to the user's Cerbungs. Tapping on this notification will redirect the user to the 'Respond' page, where they can approve or deny the request from another user to contribute to the Cerbung.</p>	<p>User can approve the request</p> <p>User can deny the request</p> <p>User can look all notifications</p>	10

Web Services and Database

Even though it is not explicitly mentioned in the table above, this project must **fully utilize the web service** as a bridging entity between the app and the database server. The database and table structures **are not provided**. Students are allowed to create their own database to accommodate this project's requirements.



Group Project

This project is done in groups with a **maximum of 3 students** and can **cross Parallel Class (KP)**. The student groups for this project will remain the same as those formed during the previous mid-term project. In the event that a student needs to switch groups, they must contact the instructor immediately and provide a valid reason for the change.

Group Presentation and Submission

The project should be submitted by uploading it to ULS by no later than **Thursday, January 4, 2024, at 11:00 PM**. It's mandatory for all group members to attend the presentation, which will be held during the final-semester exam week on **Friday, January 5, 2023**. Each group will have their designated time slot for the presentation. The location and time slots for each group will be announced later.

Questions

If you have any questions regarding the project, please feel free to contact your respective instructors or engage in discussions directly on Google Space.

