AntennaPod - Team Omega Release Summary 1

Team members

Name and Student ID	GitHub id	Number of story points that member was an <u>author</u> on.	
		Iteration 1	Iteration 2
François Crispo-Sauvé	<u>FrankSauve</u>	- CI (5 points) - Test the app (3 points) - Class Diagram (4 points) - Understand the code (≈3 points) - Build Project (0.5 point)	- Trending tab in side menu (≈1.5 points) - Add to queue (1 point)
Sarbeng Frimpong	jiggy357	- Class Diagram (8 points) - Understand the code (≈3 points) - Build Project (0.5 point)	- Add to favorites (5 points) - Mark as unplayed (1 point) - Mark as played (1 points)
Raphaëlle Giraud	<u>Raph1105</u>	- Understand the code (≈3 points) - Build Project (0.5 point)	- Mark as unplayed (2 points) - Add to queue (2 points) - Mark as played (2 points)
William Kingbede	williamkingbede	- Understand the code (≈3 points) - Build Project (0.5 point)	- Trending tab in side menu (≈2 points)
William Leclerc	<u>LeCleric</u>	- Class Diagram (1 point) - Understand the code (≈3 points) - Build Project (0.5 point)	- Trending tab in side menu (≈1.5 points)
Constandinos Papadakos	<u>Cotso</u>	- Understand the code (≈3 points) - Build Project (0.5 point)	- Episode page - Organize (3 points)

Mobile App summary

AntennaPod is an easy-to-use, flexible and open-source podcast manager for Android. It has a number of features that make it ideal for travel, such as downloading podcasts, setting up a queue and keeping track of previously played podcasts.

Velocity

For this part, please refer to the "Planning poker and burndown chart R1" document, situated in the CourseAdmin file.

	TOTAL: 11 stories, 66 points over 4 weeks		
	Number of stories	Number of points	Milestone link
Iteration 1	5	44	Milestone 1
Iteration 2	6	22	Milestone 2

Plan up to next release

For this part, please refer to the "Planning poker and burndown chart R1" document, situated in the CourseAdmin file.

	TOTAL: 9 stories, 73 points over 5 weeks		
	Number of stories	Number of points	Milestone link
Iteration 3	4	31	Milestone 3
Iteration 4	5	42	Milestone 4

Overall Arch and Class diagram

Link to all the UML class diagrams

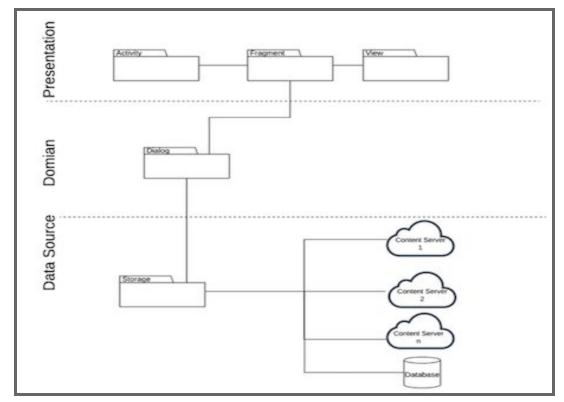


Figure 1 - AntennaPod Arch Diagram

AntennaPod uses a Model-view-controller architectural pattern which divides the application into three interconnected parts. This type of pattern is essential for maintenance as well as code reusability.

The view portion consists of the UI layer which is a visualisation of the data from the model. These consists of all files that are in the Activity, Fragments and Views folder of our application. The MainActivity class is the first interaction that a user will have with the application. They can navigate different views in order to perform a desired task. An activity focuses on what the user can do. The activity class takes care of creating a window in which the UI can be placed.

The data portion of the application is handled by the Model. It responds to request from the View and instructions from the controller. This layer is also responsible for handling business logic, network or database API. Examples of Models found in AntennaPod are Feeds, which can be downloaded, added to a queue or deleted.

The Controller accepts input which then updates the Model or View. Input received from the user is validated and then necessary operations are performed in order to modify the state of the model.

Infrastructure

Circle CI (About Circle CI)

The tool Circle CI was added to AntennaPod in release 1. Circle CI is a continuous integration system for the automated testing projects. It was added to allow for quick and automated testing of changes to the project. Failed tests can be notified to the team and fixed quickly.

Some other alternatives to Circle CI are Travis and Jenkins. Travis and Jenkins are not suitable for this project however. Circle CI offers the quickest integration and the other two offer more features than needed and offer slower integration times. Travis is more suited to testing in different environments and Jenkins is more suited to customization through plugins and requires a dedicated server. AntennaPod is only being tested on android devices and does not support plugins making Circle CI the best choice.

Code

File path with GitHub link	Purpose
TrendingFragment	Creating a page with the trending podcasts from iTunes.
TrendingAdapter	Adding functionalities to the Trending page.

Testing and Continuous Integration

Test File path with GitHub	What it is testing
link	
<u>Trending tab</u> - UI test	Clicks on the <i>trending</i> tab in the side menu and
	checks if the action bar title is equal to "Trending".
Add to favorites - Unit test	Tests the addFavoriteItemById method

AntennaPod is currently using Circle CI to build and test the application after every commit. The circle.yml script starts an Android emulator, build the application, runs the unit tests on the emulator and generates tests results. The reports can be found in Artifacts/tmp/circle-junit/junit, for example here are the results of build #107. A green check mark will be displayed next to the commit on GitHub if the Circle CI build was successful.



Figure 2 - CircleCI passing builds on Github