

How to Use this Template

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Board Game Master

Description

Board Game Master is a guide to the world of board games. If you sometimes get together with your friends to play board games you know how important it is to have the rules. But there are often no paper rules at hand or they have been outdated.

Also it is not convenient to have a single copy of the rules in a big group of people. Now this problem can be solved with Board Game Master. The app contains rules for popular table games.

Intended User

The app is for those who play board games.

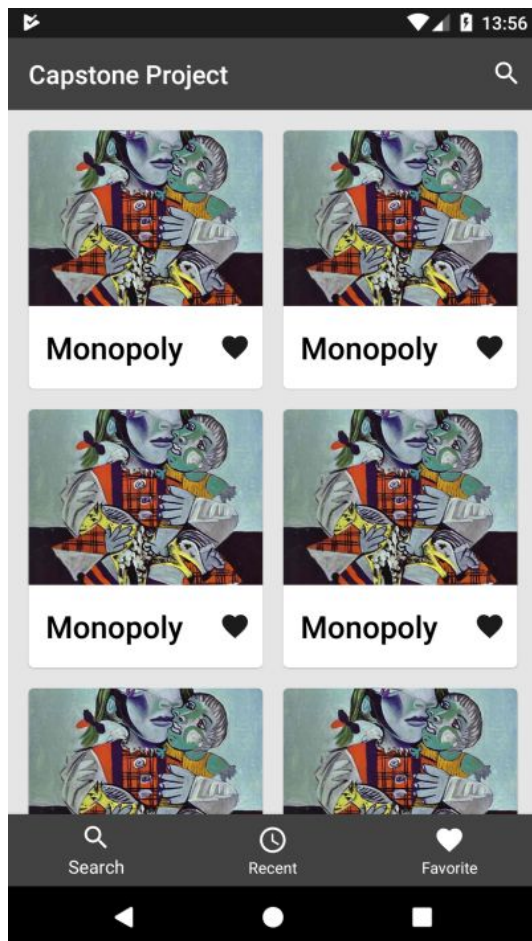
Features

- Easy access to the rules of board games
- 30+ popular board games
- User-friendly search capabilities

User Interface Mocks

These can be created by hand (take a photo of your drawings and insert them in this flow), or using a program like Google Drawings, www.ninjamock.com, Paper by 53, Photoshop or Balsamiq.

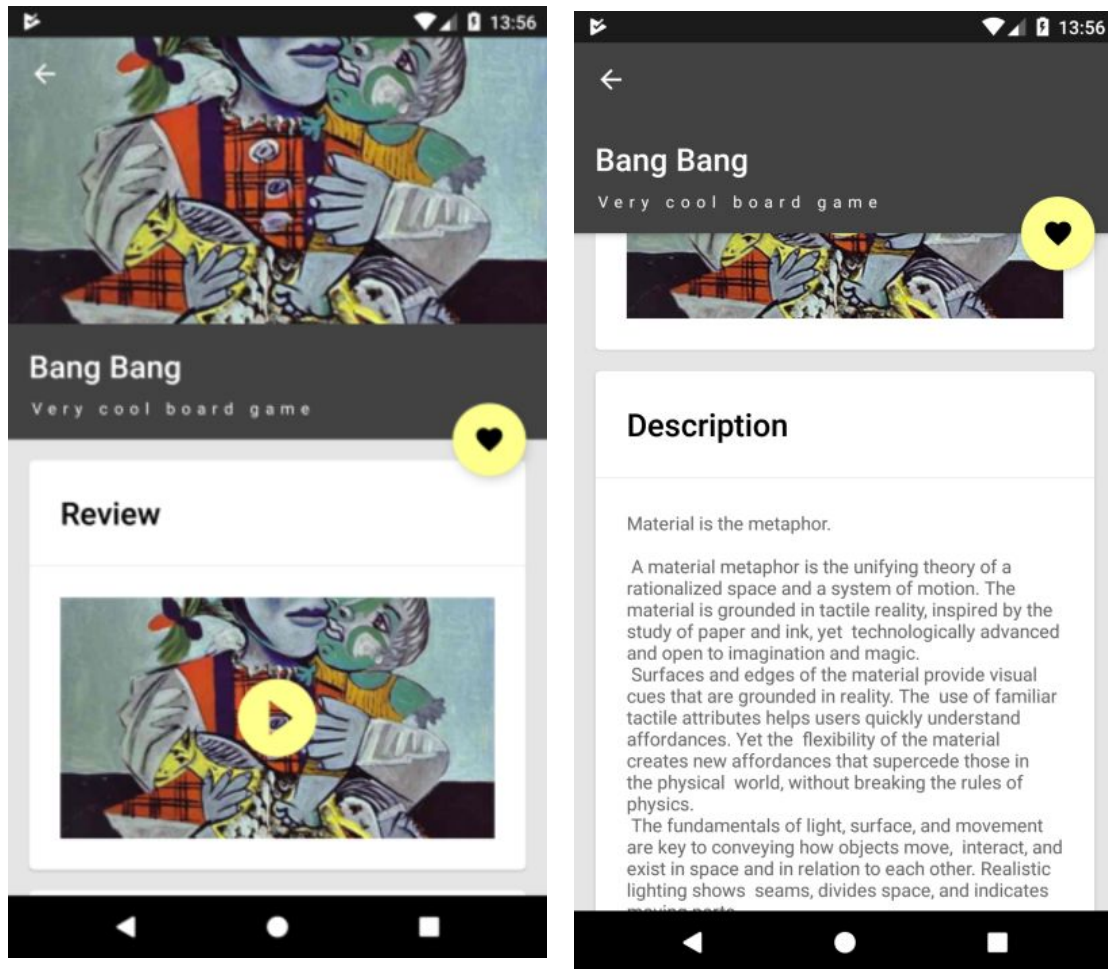
Screen 1



This is the Home Screen which will be launched when the app opens. There are 4 options:

- to view a list of board games,
- to search a board game,
- to see board game details,
- to sort the list by recent or favorite.

Screen 2



Board game details screen contains an image slider, a description and a video review of the game. CardView can be collapsed.

Key Considerations

How will your app handle data persistence?

Remote - Firebase

Local - Room

Describe any edge or corner cases in the UX.

When user types a search query, the list is filtered with one second delay.

On the main screen user can control fragments swiping to left or right.
When user clicks on a video review, he opens the YouTube application or Web browsers.

Describe any libraries you'll be using and share your reasoning for including them.

Java 8 language will be used for development.

Android Studio 3.13 IDE will be used for development.

Gradle 4.4 is an open-source build automation tool.

The Firebase JobDispatcher 0.8.4 is a library for scheduling background jobs in my app.

Picasso 2.71828 handles the loading and caching of images.

Timber 4.6.1 is a logger with a small, extensible API which provides utility on top of Android's normal Log class.

RxJava 2.1.1 – Reactive Extensions for the JVM – a library for composing asynchronous and event-based programs using observable sequences for the Java VM.

Dagger 2.15 is a fully static, compile-time dependency injection framework for both Java and Android.

Describe how you will implement Google Play Services or other external services.

I will use the Firebase Realtime Database. In order not to waste time developing the backend.
I will use the Firebase Crashlytics. It is a lightweight, realtime crash reporter that helps me track, prioritize, and fix stability issues.

Next Steps: Required Tasks

This is the section where you can take the main features of your app (declared above) and break them down into tangible technical tasks that you can complete one at a time until you have a finished app.

Task 1: Project Setup

- Create a new Android Studio project
- Configure Github
- Configure libraries
- Configure build.gradle

Task 2: Implement UI for Each Activity and Fragment

Markup app screens. App keeps all strings in a strings.xml file and enables RTL layout switching on all layouts. App includes content descriptions, navigation using a D-pad.

- Build UI for MainActivity
- Build UI for GamesListFragment
- Build UI for GameDetailActivity

Task 3: Implement Adapters

Implement common adapters

- Create BindingAdapters
- Create ScreenSlidePagerAdapter
- Create UniversalRecyclerAdapter

Task 4: Implement domain layer

Implement models and interactors

- Create BoardGamePreview model
- Create BoardGame model
- Create BoardGameDetailsInteractor
- Create BoardGamesListInteractor

Task 5: Implement data layer

Implement repository

- Implement Firebase Realtime Database
- Implement BoardGamesRepository

Task 5: Implement widget

Implement last opened board game widget

- Build UI for BoardGamesWidget
- Implement BoardGamesWidget

Submission Instructions

- After you've completed all the sections, download this document as a PDF [File → Download as PDF]
 - Make sure the PDF is named "**Capstone_Stage1.pdf**"
- Submit the PDF as a zip or in a GitHub project repo using the project submission portal

If using GitHub:

- Create a new GitHub repo for the capstone. Name it "**Capstone Project**"
- Add this document to your repo. Make sure it's named "**Capstone_Stage1.pdf**"