Project 1C - MultiQuiz Code

LATE 30/30 Points

2/16/2022

Attempt 2

REVIEW FEEDBACK
2/26/2022

Attempt 2 Score:
30/30

View Feedback

Unlimited Attempts Allowed

Details

Due: Wednesday, February 16
Points: 30
Resources:

- **Install these**:
  - build.gradle (https://drive.google.com/file/d/1BohleQ7XEQywcc_O_ffMhr9zjQlWo5q1/view?usp=sharing) (Module: MultiQuiz.app)
  - BaseQuizActivityTest (https://drive.google.com/file/d/19eibOpzVhwbXBh6FpR5DLTlzeWGe_5Kg/view?usp=sharing)
  - OrientationChangeAction (https://drive.google.com/file/d/1jDnALONtxunTYH89bV_GkxJsCt9aVqd4/view?usp=sharing)
- **Check these**:
  - AndroidManifest.xml (https://drive.google.com/file/d/1PpFenBJ2ufdxVhIRxlPT3Y3E8SWh_HCY/view?usp=sharing)
  - build.gradle (https://drive.google.com/file/d/1WeyyZFZcb-aY9RaTGX3dhmfj1qCVydMt/view?usp=sharing) (Project: MultiQuiz)
  - gradle-wrapper.properties (https://drive.google.com/file/d/123oMFa3JZG8LNy1WmyDGan36NcIMD5CS/view?usp=sharing) (Gradle version should be 7.2)

Deliverables:

- ZIP file containing
  - Entire project

Overview

Modify the MultiQuiz that you created in **Project 1B (https://canvas.vt.edu/courses/145416/assignments/1362967)** . For P1B, you should have completed steps 1–3 of "Implementing MultiQuiz". For this project, you will need to also complete steps 4–5. Step 4 involves creating the view-model for the main activity so that you can rotate the screen, and step 5 involves creating a second activity that shows the results of taking the quiz.

For step 4, focus on section "**Adding a ViewModel (https://learning.oreilly.com/library/view/android-programming-the/9780135257555/ch04s02.html)** " in chapter 4 of BNR. To access the view-model from the activity, use the following code:

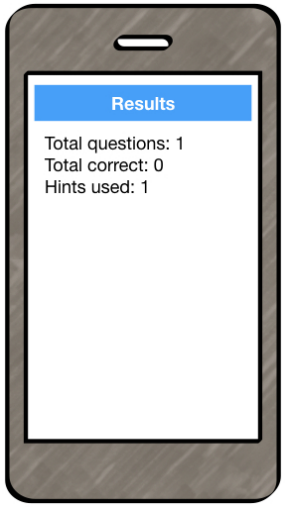
```
private val vm: QuizViewModel by lazy {
    ViewModelProvider(this).get(QuizViewModel::class.java)
}
```

The code that BNR gives for this is deprecated.

For step 5, create a constraint layout with **7** text views:

- A heading: Result
- Labels total questions, correct answers, and hints used
- Values of total questions, correct answers, and hints used. The values **must** have the following ids:
  - total_questions_value
  - total_answers_correct_value
  - total_hints_used_value

The text views should be arranged similar to the image below (you do **not** need a blue background for the heading).



As an example, here is text-view code for the total questions label and the total questions value:

```
<TextView
    android:id="@+id/total_questions_label"
    android:layout_width="wrap_content"
    android:layout_height="wrap_content"
    android:layout_marginTop="8dp"
    android:text="@string/total_questions_label"
    android:textSize="18sp"
    app:layout_constraintStart_toStartOf="@+id/results_header"
    app:layout_constraintTop_toBottomOf="@+id/results_header" />

<TextView
    android:id="@+id/total_questions_value"
    android:layout_width="wrap_content"
    android:layout_height="wrap_content"
    android:layout_marginStart="8dp"
    android:text="@string/total_questions_value"
    android:textSize="18sp"
    app:layout_constraintBottom_toBottomOf="@+id/total_questions_label"
    app:layout_constraintStart_toEndOf="@+id/total_questions_label"/>
```

The results activity will be reached by clicking the "submit" button from the quiz activity after all four quiz questions have been answered. To pass data from the quiz activity to the results activity, see the section "Passing Data Between Activities (https://learning.oreilly.com/library/view/android-programming-the/9780135257555/ch06s03.html) " from chapter 6 of BNR. While you should understand the concepts in the subsection "Getting a Result Back from a Child Activity", you will not need to pass any results back in this project.

Testing MultiQuiz

Implement MultiQuiz by modifying the code from the AnswerButton app.As you evolve AnswerButton into MultiQuiz, make sure you can meet the following

Naming and Other Project Requirements

In order for our tests to work correctly, you **must** meet the following naming requirements.

- Your application package name must be "edu.vt.cs.cs5254.multiquiz"
- Your application name must be "MultiQuiz"
- Your main activity must be named "QuizActivity" (do not use MainActivity)
- Your second activity must be named "ResultsActivity" (note that "Results" is plural)
- In activity_quiz.xml, the IDs for your buttons must be:
  - *answer_0_button*
  - *answer_1_button*
  - *answer_2_button*
  - *answer_3_button*
  - *hint_button*
  - *submit_button*
- In activity_results.xml, the IDs for the text-views that hold your values must be:
  - *total_questions_value*
  - *total_answers_correct_value*
  - *total_hints_used_value*

You must use the following files in your project. You may not alter these files in any way. If something does not work for you, ask on Piazza.

- **build.gradle (https://drive.google.com/file/d/1BohleQ7XEQywcc_O_ffMhr9zjQlWo5q1/view?usp=sharing)** (Module: MultiQuiz.app)
- **BaseQuizActivityTest (https://drive.google.com/file/d/19eibOpzVhwbXBh6FpR5DLTlzeWGe_5Kg/view?usp=sharing)**
- **OrientationChangeAction (https://drive.google.com/file/d/1jDnALONtxunTYH89bV_GkxJsCt9aVqd4/view?usp=sharing)**

In addition, check the code in your project agains the following files to ensure that it is the same. When in doubt, use the code here.

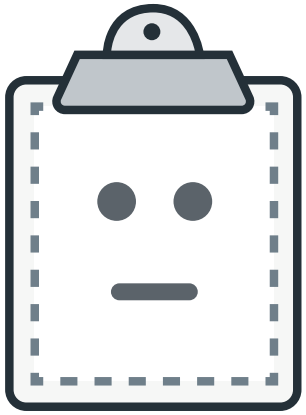
- AndroidManifest.xml

- build.gradle (Project: MultiQuiz)
- gradle-wrapper.properties (Gradle Version)

Finally, your application should run on the following emulator:

- Pixel 2 API 30

When using the base test cases to test your code, you must use a Pixel 2 emulator running API 30. This is what we will use for the final test suite.



Preview Unavailable

MultiQuiz-1.zip

Download

(https://canvas.vt.edu/files/22207089/download?download_frd=1&verifier=2czhfD69gfOvXvCTpJ5LvJzLDFbY0DuuU2qv5rTr)

You are unable to submit to this assignment as your enrollment in this course has been concluded.