**Project Documentation -**

(description of app)

**Front End (.xml)**

* **Activities**
  + **Homescreen**:

The homescreen is the first screen of the program and holds 2 critical elements: the play button and the highscore.

* + **Question**:

The question interface is a generalized interface that will represent

a puzzle object. It contains the name of the puzzle, a

image/diagram relating to the puzzle, the puzzle text, and a input field for the answer. The interface also has the capability to go back to the homescreen, and submit the user’s answer.

**Back End (.java)**

* **Database: based of the Android Room Persistence Library**
  + **DataProcess**: This object represents a sql database instance and includes functions to get incomplete puzzles and update completed puzzles.
  + **Puzzle**: This object represent the columns in the SQL table and works with the Room library to build the SQL statements.

* + **Puzzle Data Access Object (DAO)**: A interface used by the Room Library to create the SQL getter functions (ie. getNextPuzzle())
  + **Puzzle Database**: used by the Room Persistence Library to access the DAO
* **Activities**
  + **Homescreen**: the backend for the home screen that loads critical data
    - On first run the Puzzles are loaded from file into the database
    - The play button is given a click actionListener that will go to the Question activity.
  + **Question**: The backend for the Question activity that loads a new puzzle and handles the game logic.
    - On load it access’ the SQL table and gets the next unsolved puzzle ordered by complexity and fills the fields.
    - Adds click events for the back and submit buttons