

## *Team “21” Idea for quizclass*

As our Prophet Mohammed said, "Teach children while they play." As a team, we're focusing on using cognitive games to gather data on children's performance in various learning areas like spelling, writing, problem-solving, and logical reasoning, based on the level of the child. Here's how we plan to do it:

**1. Selection of Cognitive Games:** The team will select or develop a suite of cognitive games that are designed to target different learning areas. These games should be engaging and interactive, encouraging children to actively participate and providing valuable insights into their cognitive abilities.

**2. Data Collection:** Each time a child interacts with the cognitive games, various data points will be collected. These may include:

- Time spent playing each game
- Accuracy of answers
- Strategies used while playing (e.g., trial and error, systematic approach)
- Frequency of correct answers
- Areas where the child struggles or excels

**3. Database Management:** A centralized database will be created to store all the collected data. This database will be regularly updated (every 50 hours of usage of the application for example) as children continue to use the application. **The data will be securely stored** and **anonymized** to ensure privacy and confidentiality.

**4. Analysis and Insights:** Data analysis techniques will be applied to the collected data to identify patterns, trends, and areas of concern. This analysis will help pinpoint specific learning challenges and difficulties that children may be facing in spelling, writing, problem-solving, and logical reasoning.

**5. Personalized Learning Model:** Based on the insights gained from the data analysis, a personalized learning model will be developed for each child. This model will take into account the child's strengths and weaknesses in different learning areas and recommend exercises or activities tailored to their needs.

**6. Feedback and Recommendations:** Recommendations for additional support or interventions will be made as needed to address any identified learning challenges.

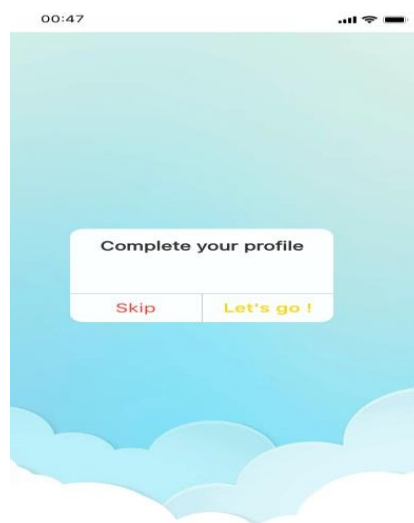
**7. Iterative Improvement:** The application will continuously evolve based on user feedback and ongoing data collection. Updates and improvements will be made to the cognitive games, the personalized learning model, and the data analysis techniques to enhance effectiveness and usability.

## Prototype(example) :

By implementing this comprehensive approach, we aim to provide valuable insights into children's learning abilities and support their educational development effectively .

Our prototype will feature quizzes accessible within the user's profile section. Upon logging in, users will be presented with the option to either complete their profile or defer this task for a later time.

This will continuously appear until the child completes his profile :



When the user clicks on **skip** the profile information will always remain **red** (uncompleted profile ):



When the user clicks on let's go , a series of games will appear:



The games included in the prototype will be as follows:

**Mathematical Skills Game:** This game will focus on testing mathematical abilities through interactive challenges and exercises.

**Logic Games:** The second game will engage users in logic-based puzzles and activities to test critical thinking and problem-solving skills.

**Memory Games:** The third game will offer memory-testing exercises designed to strengthen recall and cognitive function.

**Spelling Song Game:** The final game will involve singing, where children can test spelling while singing along to lyrics displayed on the screen. (our model would be able to read audio files).

Example :When the **score** of the **Spelling Song Game** is low we going to suggest continuously the classes of spelling provided in quizclass

