Use case: Play single-player game

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| Use Case Name | Play single-player game |
| Scope | Plumbers on ICE Game App |
| Level | User goal |
| Primary Actors | Player |
| Stakeholders and Interests | - Player: Has the goal of reaching the end of the current level in the shortest amount of time that he can, while collecting coins to increase his score. |
| Preconditions | User has initiated a single-player game session |
| Success Guarantee | The player is able to reach the end of the level, with a certain level of difficulty depending on the particular level, and his score is recorded if it exceeds his previous best score for the level. |
| Main Success Scenario | 1. The player's character starts at the predefined starting point for the level.  2. The player has two basic actions available to him: Walk forward, and jump.  i. **Walk forward**: The player's character proceeds horizontally, to the right. If this input is held down, this action continues until it is released.  ii. **Jump**: The player's character 'jumps' in the upward direction and is pulled back down due to gravity.  iii. These two actions can be **combined** by using Jump while holding Walk forward. The character will leap upward while maintaining its horizontal velocity – allowing for the player to leap between platforms and over obstacles.  3. The player navigates through the level by using appropriate actions while avoiding hazards and collecting coins.  4. The player succeeds in reaching the end of the level.  5. The system calculates the player's score, based on elapsed time and coins collected.  6. A message is displayed, along with the player's score. |
| Extensions | 3a. Player allows the character to come into contact with an 'enemy' or other hazard, or the character falls to the bottom edge of the play area.  i. The character 'dies' and is placed again at the current level's starting point. The main scenario begins again. |
| Special Requirements |  |
| Technology and Data Variations List |  |
| Frequency of Occurrence | High |
| Miscellaneous |  |