High Concept Document

For the game: **Cubity**

High Concept

You are trapped inside a room full of square objects and the exit door is out of your reach. The only way out is to manipulate the objects around you to build a way to the exit! Pass several levels to reach the outside.

Features

- Different solutions for each level. (Different ways to overcome obstacles)
- Touch controls to move in a 3D game environment.
- First person perspective.
- Touch controls to manipulate objects within the 3D environment.
- High level of immersion due to fully interactive game environment instead of graphical user interface.
- Collision detection
- Multi-touch display gestures

Overview

Genre – puzzle / escape the room
Target Hardware – Android™ touch device (Samsung Galaxy Tab 2 10.1, Android version ≥ 4.0 IceCreamSandwich, 1280x800px, 16:10, OpenGL ES 2.0)
Target Customer – Casual mobile game player, due to the short playtime, perfect for in between
Player Motivation – The player wants to solve the puzzle, understand how the pieces work together, explore the different possibilities or just play around with different objects.

Unique Selling Points

The game offers intuitive touch controls for manipulating (moving, scaling, rotating) objects (simple cubes and cuboids) in a 3D environment. In order to solve a level the player has to combine different types of cubes to build a way to the exit.

Gameplay

The player can look around and move with touch gestures. Movement happens with a double tap with his finger on an object or point. Thereafter, the camera starts moving slowly towards the targeted point. With tapping, the player can only move on the x and z axis. In order to jump, he needs to use two fingers parallel to each other. In order to look around in the room, slide gestures can be used to rotate the camera around the X and Y axis. The player has to tap and hold for looking around.

In order to reach the exit, the player has to use the objects to build staircases, build bridges, fill gaps, etc. There are three different kinds of interactive objects:

- Yellow cubes can be moved along one or two axis (e.g. a yellow cube can be moved along X and Z axes, another yellow cube can only be moved along the Y axis, another yellow cube can be moved along Y and Z axis). To move yellow cubes the player has to tab with one finger on the cube and then slide it along the allowed axis.
- Blue cubes can be scaled in one, two or three dimensions depending on the cube. The player has to perform a pinch gesture with two fingers on the cube to scale it alongside the allowed dimensions.
- Green cuboids can be rotated around a predefined pivot point on a single axis. To rotate a green cuboid the player has to perform a rotate gesture with two fingers on it.

The player can manipulate all visible objects from any place within the room as long as they are not completely occluded. To manipulate a cube it simply has to be touched. Simultaneous manipulation of multiple objects is possible due to multi-touch gesture recognition. If there is no continuous way to the exit, the player falls into the gap onto the ground floor.

When the player finished combining the cubes and there are no remarkable gaps in between them, he can climb the staircase/run over the bridge in order to reach the exit. Entering the exit means entering a new level.

Example Walkthrough

In each level the player finds himself/herself in a room which only has one exit that is not directly reachable (e.g. the exit is on the other side of a huge gap, on a higher platform or behind a wall). The level is filled with different cubes lying on the floor or floating in midair. A short introduction explains the controls. The player then navigates around the room and manipulates the cubes through scaling, rotating and translating until he can build his way to reach the exit. There are multiple ways of combining the cubes. When he succeeds in reaching the exit he enters the next level. This is repeated until he clears all levels.

Competition

There are similar puzzle games like *Portal* or *Antichamber*. However those games are rather targeted at hardcore gamers than for casual gamers. Also those games are only available for PC/Mac/Console and not for mobile devices. In the mobile sector there are plenty of puzzle games but they are rather in 2D. Even though there is a similar first person 3D puzzle game for Android called *GRAVITY* (http://www.youtube.com/watch?v=qxF8TW4_oag), the gameplay is focused on physics based puzzles and controls are provided by virtual thumbsticks and buttons. Furthermore there is no touch interaction with 3D objects in any way in *GRAVITY*.