Competitive Analysis

# Description of Your Planned Project

Briefly describe the project you’re planning to work on (in this case, the game Breakout). What is the goal of the game? What are its main features?

My planned project is a multiplayer platformer. The goal of the game for one player will be to avoid obstacles and reach the end of the level. While the goal of the game for the other player will be to create obstacles and other impediments such as changing effects such as weather (wind, precipitation, etc.) to prevent the player from finishing the level.

# Evaluating Your Competition

Identify 3 similar projects that already exist. For each competitor project, write a few sentences that describe:

* What the project provides to the user
* What makes this project unique

<http://www.thewayoftheninja.org/nv2.html> N+:

* Platformer where you can see the entire level at once
* Set types of enemies/obstacles per level
* Co-op option
* Physics engine is clean
* Complex and interesting level designs
* Can collect coins for points.
* Wall climbing and jumping

<https://en.wikipedia.org/wiki/Dustforce> Dustforce:

* Multiple characters
* Many movement options, double-jump, wall jumps, dashing mid-air, etc.
* Levels are graded on D-S scale
* Ability to unlock extra features
* Survival and king of the hill features (multiplayer)
* Fast-paced movement

<https://en.wikipedia.org/wiki/Super_Mario_Bros>. Mario:

* Has powerups
* Many enemies which move and also contribute to the movement
  + Ie. Using shells
* Powerups to make weapons more interesting
* Lives system
* Multiple paths, but has one set path to go through
* Combines with an adventure game
* Co-op option

# Identify Comparison Dimensions

Come up with a list of at least five attributes or features that you want to compare between the competitor projects. These dimensions should be user focused (i.e., something that the user can directly observe or experience).

For each dimension (**rank ordered from most to least important**), provide both the dimension name and why the dimension is important.

1. Game Physics: A player will expect to be able to move around the map in a proper and logical way, players also like to be able to move in fast and responsive ways so that it feels like they are in control of their character. What mobility options are given to the player?
2. Diversity of Obstacles: The obstacles such be interesting and unique so that the players stay interested. These can be in the form of set traps, like bombs in N+ or enemies like in Mario.
3. Level Design: Are the obstacles aligned into a challenging level, where the player will be challenged to beat the level? Is the level new, and interesting in different unique ways from previous levels?
4. Opportunity to interact with others: Does the game have interaction between its players if it has multiplayer? Do the actions of other players influence the actions which you will take? Example being the king of the hill mode of Dustforce.
5. Storyline: Does the story make sense, is there any story to follow? Stories make the game more compelling and interesting to play and follow along.

# Comparison Table

Fill out the table shown below with the features you identified in the section above.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | **Physics** | **Obstacles** | **Level Design** | **Interaction** | **Story** |
| N+ | Jump heights are larger than expected, and run speed. Acceleration is maintained through jumps and lost quickly on slopes. Has walljumping and slowed fall rate on a wall. | Diverse obstacles, bombs on ground, guided missiles, lasers, etc. | Level design begins simple and gets increasingly more complex and interesting, the diverse obstacles make level design more diverse | No real interaction in co-op mode, pretty much just two people trying to do the same level at the same time. | No real story or plot to why these stick figures must get through the puzzles. |
| Dustforce | Fast moving platformer with interesting mechanics such as double jumping, walljumping, etc. | Enemies are diverse with unique attacks, plays like an adventure game. | Large levels which require scrolling, unique and encourages exploring entire map to sweep. | King of the hill style mode where there is interaction between players, no interaction in main story/co-op | Somewhat large story and plot, may appeal to some. Again, plays like an adventure game. |
| Mario | Less complicated physics, simple jumping and running/walking. No special movements. | Monsters and platforming challenges, monsters are somewhat repetitive, obstacles. | Fairly simple level design, large in amount of levels. Scrolling | Little to no interaction in co-op option. | Has a story, but simplistic goal of saving peach, which does not especially progress. |

# Summary

Using the results from your comparison, provide a summary of your findings. You should concentrate on

* Features that your project will need to be competitive
* Identified gaps that your project can take advantage of

The platformers which I analyzed have unique and complex physics mechanics except for Mario, and have special movement options such as wall jumping, which could be implemented into my platformer. Also, unique obstacles are a central theme within the platformers analyzed so I could implement both monsters and stationary obstacles. My idea centers around the idea of interactivity between the two players, one of which who is trying to beat a level, while the other is trying to create obstacles and alter the level. To make a good game, the player making obstacles should have many options in altering the level, or different options based on the level. There should also be a deeper strategy to the competitive aspect of my game, ie. Should the player get power-ups to make the level easier, or try to complete it as fast as possible? Will god focus on preventing the player from getting these power-ups or prevent him from getting to the end?