## **Game Proposal**

# **Working Title: E**

#### Team:

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## **Description**

Our game will be network battle game. We will start by a 1 vs. 1 game, but want to keep it open to maybe support more players. It should be a fast game, with only a few minutes per battle.

The core of the game are the Energies. Energies will manifest themselves in their elemental forms (e.g. water, fire, earth,...) in the environment. They will usually not exist in a pure form but as a mixture. Water and fire might be steam (air), while fire and earth will result in lava. Every form has a physical and graphical representation within the game. Earth-energy might form hills or walls, water lakes and fire lava... The characters can acquire these energies by absorbing them actively. While absorbed by a character, the physical and graphical representation of the environment will change. The hill will vanish or even form a valley, the lake will run dry. At the same time, the initially plain and neutral character will change its appearance to resemble the kind of energy it acquired and will grow according to the amount he absorbed. Once energy has been obtained, it can be used by the character to attack its opponent, thus releasing again some of the energy. A character may also attack its opponent indirectly, by releasing bigger amounts of energy into the environment - thus again manifesting the energy physically. He might grow a wall to protect himself or flood an area to drown his opponent. An interesting element in the game will of course be how to combine what energies to achieve the desired result.

### **Special Graphic Features**

*Terraforming* - the environment should be highly interactive, allowing the character to modify its shape actively by absorbing/releasing energies.

*Energy effects* - depending on the type of energy, the environment will be dynamically influenced. For example water should flow down the hills and erode them, while a fireball flying over the terrain might leave a burning trail.

Texture-blending - the texture of the environment as well as of the characters will be highly dynamic, since energies can be mixed and must therefore be blended together in a smart way.

Terrain - rendering - Large scale, real-time dynamic terrain rendering is a difficult task. We will try to achieve this via smart usage of on demand loading via a quad-tree.

Character morphing - we will not implement real morphing. The character will change its appearance mainly due to texture. But we think of adding a particle system to the character, which will be interpolated between the pure energy states.

Special Effects - Post-processing effects, such as smoke or fire will add enormously to the atmosphere in the Game. We will have to add a lot of them, depending on the underlying

energies and the interaction between these energies. For example when water clashes onto fire, the result should be steamy explosions...

Distributed Terrain - Even though not directly a graphic feature, we will have to synchronize the terrain, the energies as well as the player continuously. Especially the energy synchronization might be critical, since it could render the whole system unstable.