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TEAM 1   PROTOTYPE – MORPH MADNESS

Game Programming Lab 2011
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Game Rules

Setup

Each player gets the following items:

- Three transformation cards

Transform Level++	Transform Level--	Preserve

- Three movement cards

Movement Left	Movement Straight	Movement Right

- Thirteen accelereation cards

Acceleration -5	...	Acceleration +4

- Ffive figures with different levels
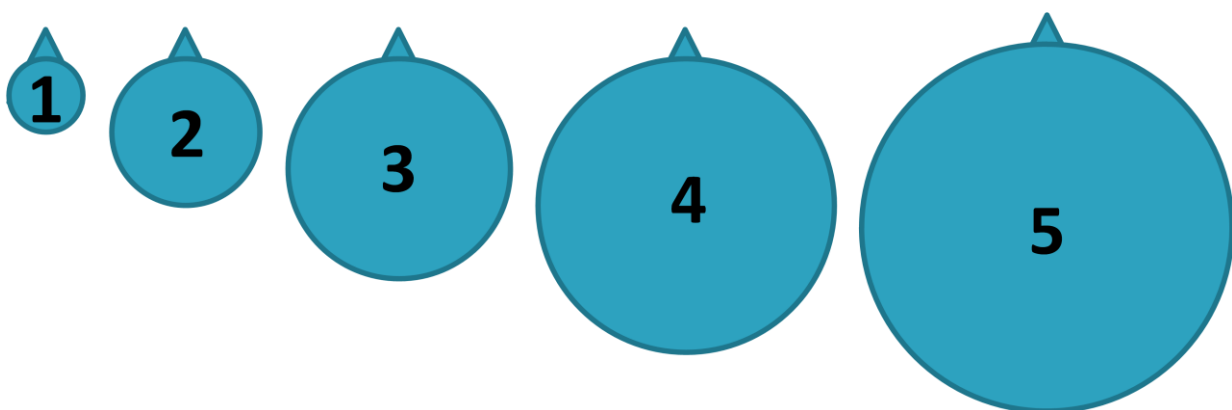
Game start

Now each player rolls a dice. The player with highest value can choose the starting position. After that each placer can choose the position in counter-clock-wise order. The starting level is 3 for each player.

Game round

1. Each player has to choose one of the transformation and one of the acceleration card and put it face down on the table such that the other players don't see it
2. Together all the players turn their cards and move/transform their figure in the following order:
    a. Change your game figure to the new level you selected with your level card.
    b. Change your speed according to your acceleration card and move in the direction you look. You cannot accelerate to more than the maximal speed of your new level (state cards) but you keep your speed for this round if it's already higher.
    c. Turn your figure to a maximum difference of 45°
    d. Cap your speed to your new speed limit

Hitting another player

If you hit an enemy figure two things can happen:

a) If you're size is bigger or equal to the enemy you will bump into him staying at the same position
b) If you're bigger than the enemy figure, the other figure will be destroyed and will lose the flag

Capturing the flag

When you drive over the flag you capture it. In the level changing step you now also have to exchange your figure with a flag-carrier figure.

The folloing penalties are applied:

a) You lose and cannot gain level 1 or 5 for as long as you carry the flag

Every round you survive you gain 1 victory point.

Falling into a hole

If you drive into a hole, the three following things can happen:

a) You are destroyed if your level is 1 or 2
b) You get stuck if your level is 3
c) You can move freely if your level is 4 or 5

Falling off a platform

If you're not able to prevent your figure from falling off a cliff you will have to suspend a round. You're only able to place your figure on a new platform in the next round like in the game setup.

Black hole respawn

To set the black hole position a dice has to be rolled. The black hole will be set to the platform with the same number as shown by the dice. The dice will be rolled a second time to determine the exact sector of the black hole on the platform

Game goal

The player which is able to carry the flag for 20 rounds (accumulated) is the winner!

State cards

Level 4	Level 3	Level 2	Level 1
velocity 5 m/sec acceleration +1 m/sec^2 - 4 m/sec^2	velocity 6 m/sec acceleration +2 m/sec^2 - 3 m/sec^2	velocity 7 m/sec acceleration +3 m/sec^2 - 2 m/sec^2	velocity 8 m/sec acceleration +4 m/sec^2 - 1 m/sec^2

Unfinished ideas

We thought about buying upgrades after each round with money gained from carrying the flag or destroying other players.

Material Wood **Costs: 500** Max speed: +3 Level: -1 Special: swims	**Material** Metal **Costs: 500** Max speed: -1 Level: +3	**Material** Aluminum **Costs: 800** Max speed: +4 Acceleration: (+)+1	**Material** Carbon **Costs: 1000** Max speed: +4 Acceleration: (+)+2 Level: +1
UPGRADE Turbo Engine **Costs: 200** Acceleration: (+)+1	**UPGRADE** Shield **Costs: 200** Level: +2 Max Speed: -1	**UPGRADE** Breaks **Costs: 100** Acceleration: (+)-1	**UPGRADE** Aero Dyn. **Costs: 300** Max Speed: +1

Experiences

Prototyping was very helpful for the "chasing" phase of the game. Penalizing the flag carrier is very important but it's really hard to balance the parameters such that it's not impossible to get away when carrying the flag.

In addition we got some ideas of how to parameterize the different size levels concerning maximum speed, acceleration and deceleration.

Issues

- It was very hard to change the game from a 3D idea to a 2D game since we will use the third dimension extensively in the final game.
- Changing from continuous to discrete (world, actions, etc.)
- Adaption of real-time scenarios.

Improvements

- Multiple paths from platform to platform are helpful for enemy players and increase the game dynamics.
- We developed a lot of new map design ideas which would be interesting for the final game.

What was fun?

- The random respawn after falling off a platform introduces a nice factor of chance. You might get an advantage out of it depending on where you land but we're planning to penalize the act of suicide.
- A player is able to strategically move through the map to gain an advantage over the enemy.
- A player is able to destroy enemies which are not carrying the flag to improve his own standing (and later also his money balance).

Impressions

Preserve

Transform
Level--