



PROJECT

Game Concept Document



Sandwich Team

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INDEX OF CHANGES

- **12/01/22:** Create document
- **14/01/22:** Add Table of contents
- **17/01/22:** Update Introduction ; USP ;
Story & Univers ; Project framework ;
Camera ; Character ; Controls ; Index |
Add Mockups ; Interactive bricks
- **24/01/22:** Mise en page,
- **28/01/22:** Update Global
- **30/01/22:** Re-reading
- **03/02/22:** GCD group decision
- **04/02/22:** Detail game structure
- **05/02/22:** Update Throw features
- **07/02/22:** Finishing touches



INTRODUCTION

VR games are known to be a good environment for experimentation with physical elements and slow pace gameplay. The possibility to exploit the space around the player to its fullest leads to a more immersive experience than games built for a more classic platform.

For these reasons, we are orienting our gameplay toward a **puzzle game** style, **using physical elements** and off-the-wall context to create a funny and logical thinking experience.

PROJECT FRAMEWORK

PROJECT



" Ready to give your right arm to get out of here? "

Plateforme:

- VR headset: Oculus Quest 2

Genres:

- Puzzle / Physique

Target:

- Age: 12 years old
- Mid Core

Ratings:

- PEGI 7+





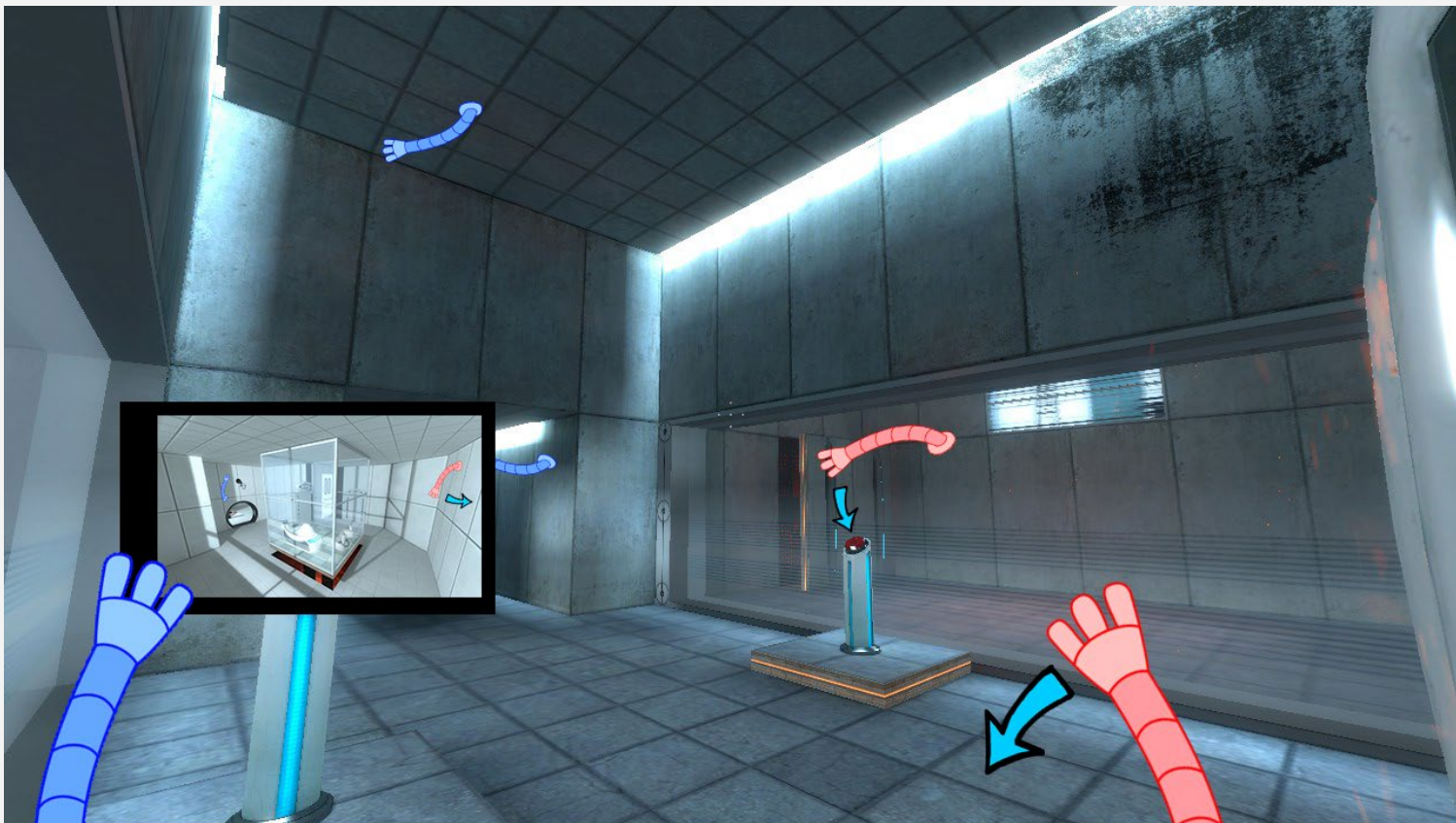
USER SELLING POINT

USP: The only game that will make you feel like you have more than 2 arms!

You can detached your arms from your body and throw them away. They will snap to the hit surface. Each left arms and right arms on the map are operated by the left and right controllers of the player, and all move synchronously with his movements.

KSP:

- Giggling physical based puzzle.
- Chaos management



This visual is not representative of the final product.

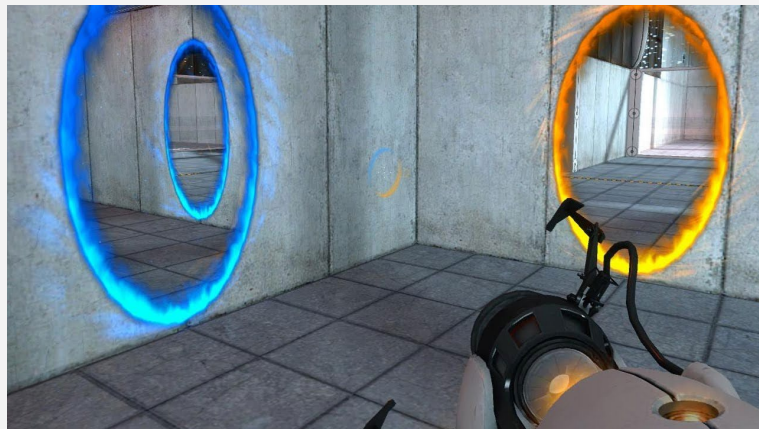
STORY & UNIVERSE

Story :

Play as a test robot in a prosthetic arms factory. The year is 2077, and you are tasked with the testing of various autonomous prostheses under various stress conditions. The management section is very stingy and likes budget cuts, so you have to test multiples arms at once since you are the only test bot of the factory..

Themes tackled:

- Consumerist society
- Technological evolution
- Capitalism



AMBIANCE REFERENCE

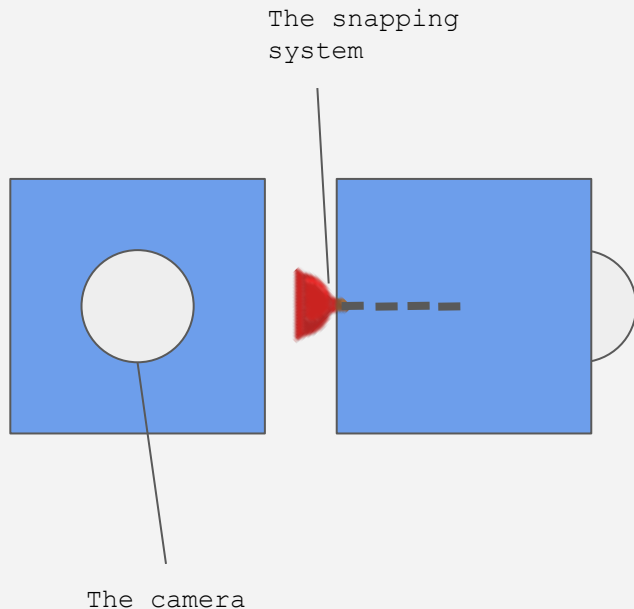


3C – CAMERA

Main body camera:

- First person view, basically the eyes of the robot.
- 360° field of view allowed with the VR headset.
- The player must limit his movements in his playroom to a certain distance from the starting position of the headset or the game will issue a warning and cut the view.

3C - CAMERA

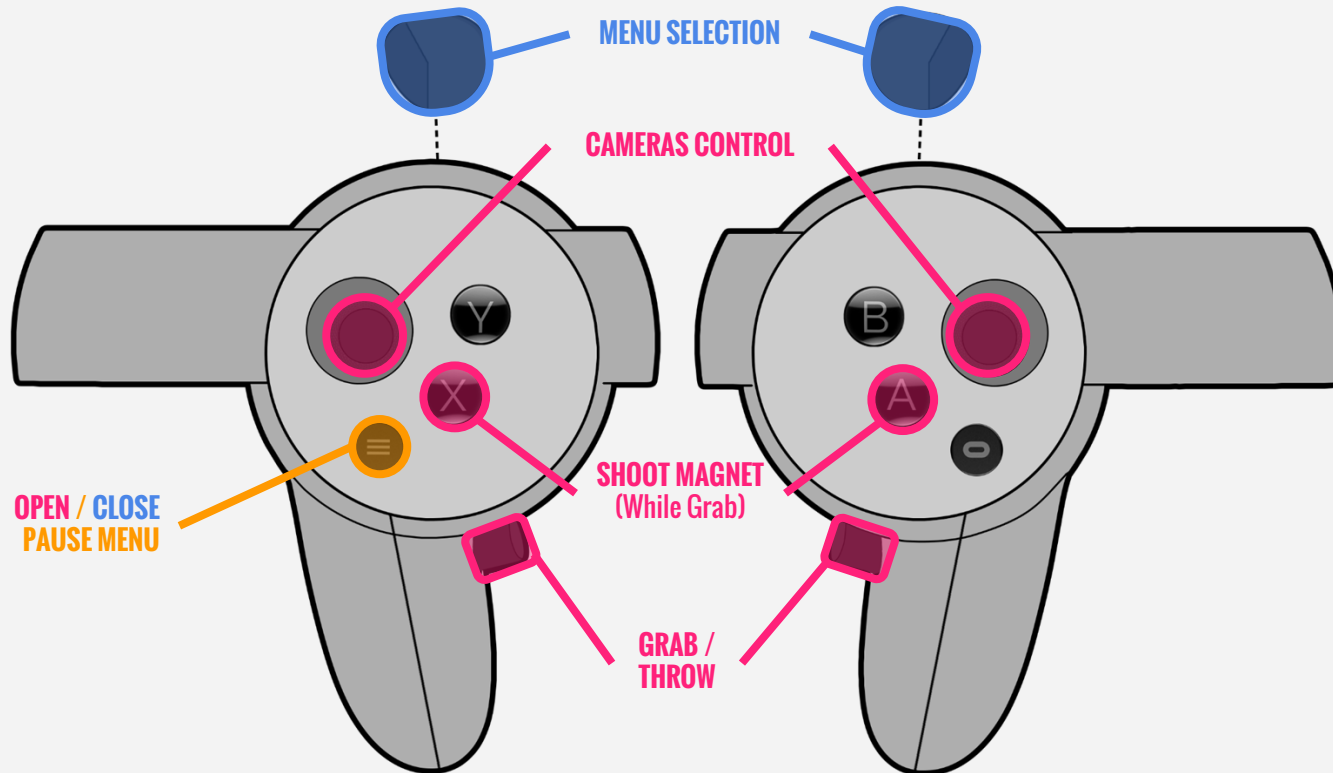


Security cameras view:

- Multiples additional point of view
- **Limited 180°** field of view.
- They can snap on surfaces.
- **All cameras can be controlled by joysticks** (both) at the same time on the X & Y axis.
- Vision is turned off when throwing the camera.
- Cameras' views **are displayed** on a physical screen that can be moved by the player and that are not affected by gravity.
- Each camera has a screen.

3C – CONTROLS

LEGENDE
IN GAME
IN MENU
BOTH



3C – CHARACTER

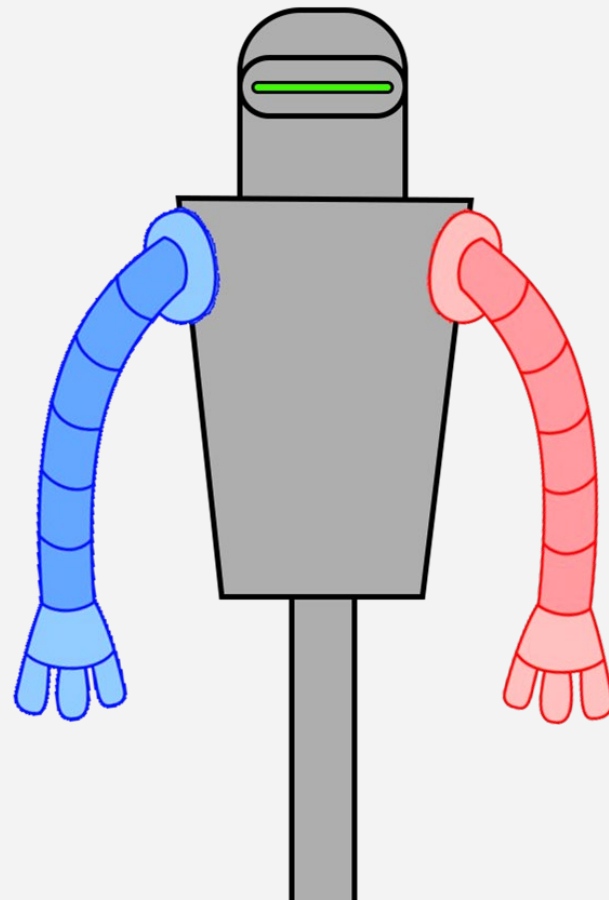
The character is a robot with no legs.

Challenges:

- **Can't move**,
- Rooms structures and interactables objects placement.
- Have a **limited** amount of arms in stock by level.

Capacities:

- Can **detach** his arms,
- Can control his synchronised arms from a distance,
- Can **shoot** a magnet who attract arms,
- Can look around on a 360° view,
- Can throw/control/see through throwable little camera boxes.

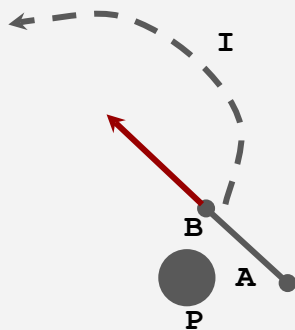


3C – THROW FEATURES

Throwing assist:

When a **player (P)** do a movement to throw the throwing assist system will create a **vector (red)** of direction depending the **start (A)** and **end (B)** point of the grabbing hand. Then it will apply a constant **impulse (I)** (*not depending on the player's strength*) doing an arc into the object throw to lead in the direction of the vector.

This way, any player can throw the objects in the direction they want.





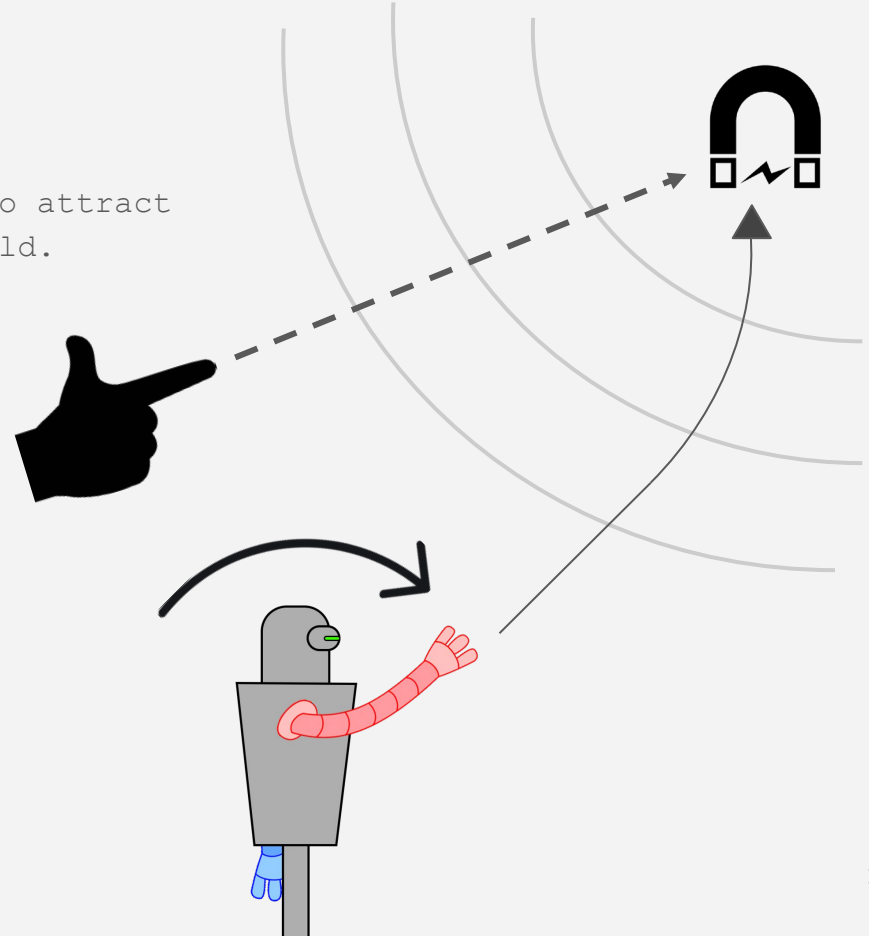
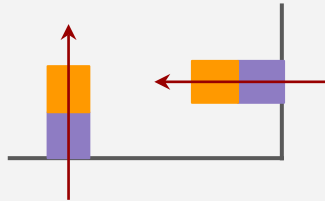
3C – THROW FEATURES

Magnet:

Player can shoot a magnet with this finger, who attract arms when they pass through its attractive field.

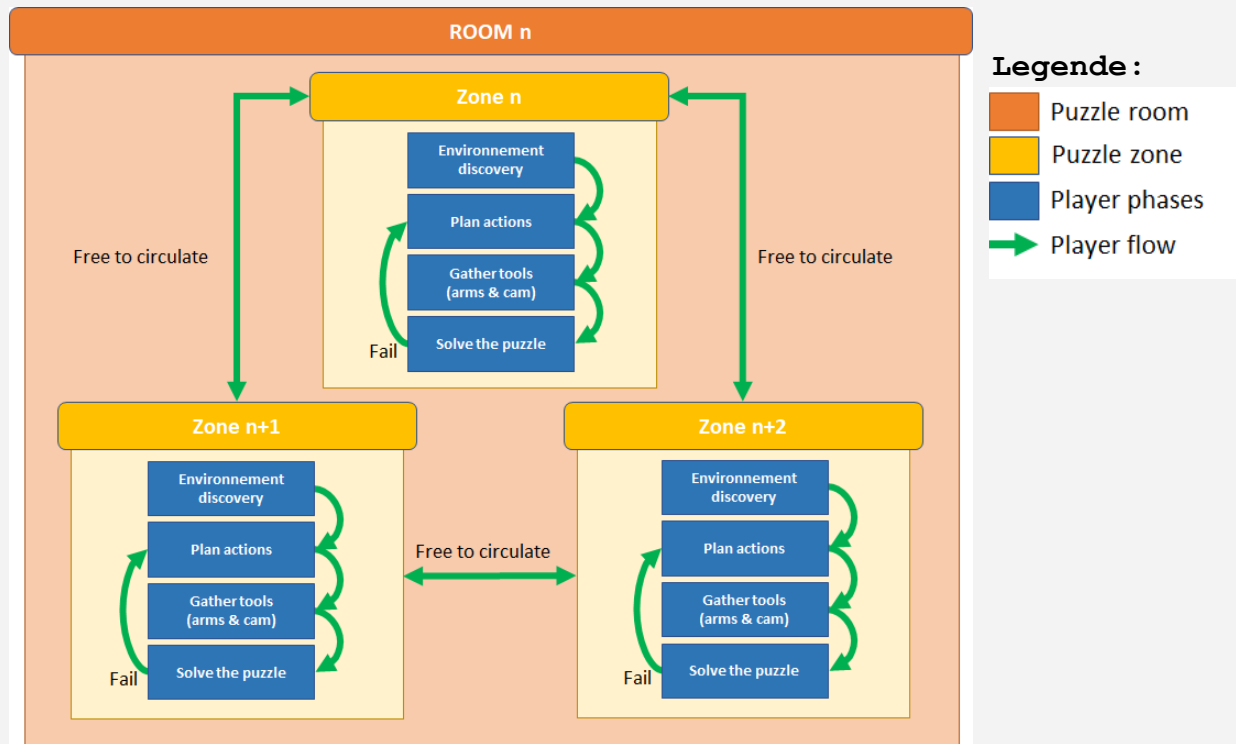
Snapping object:

Objects will snap and self-orient perpendicular to surface.



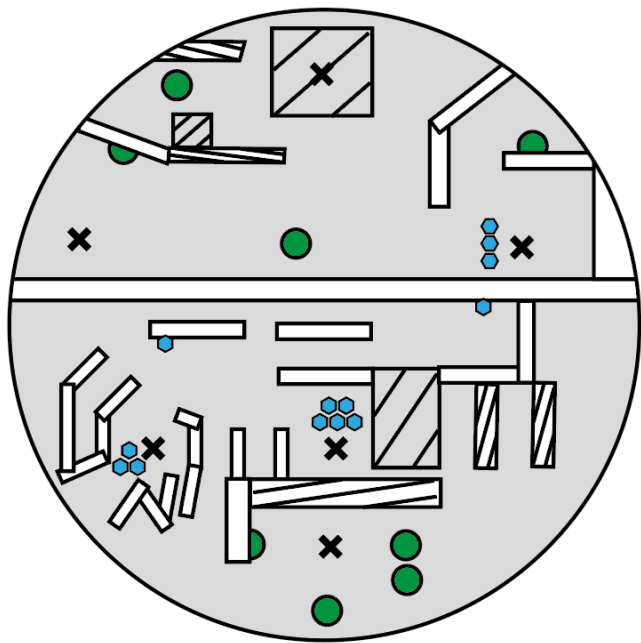
GAME STRUCTURE

Sandbox :



GAME STRUCTURE

Sandbox:



This diagram is not at scale

- The first part is composed of three **zones** that will allow the player to become familiar with the game and master the tools at his disposal.
- The second part is a free **zone** where the player can interact freely with the different tools at his disposal and test the limit of the elements.

Legende :

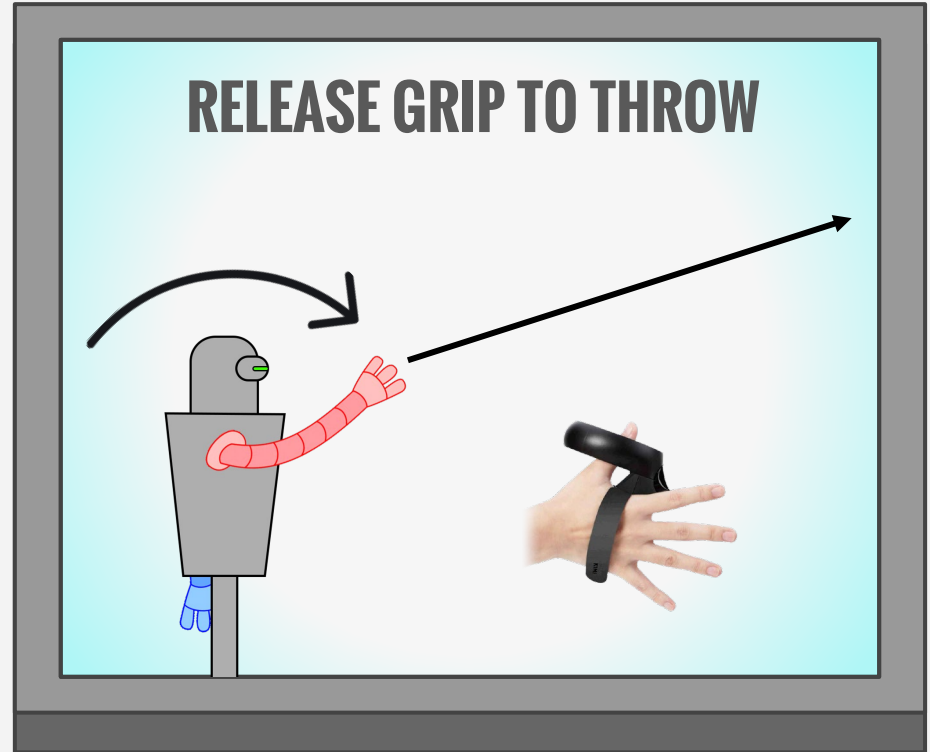
Ground/Ceiling	Ground/Ceiling - Can't snap	Player spawn	Camera link to monitor
Wall	Glass Wall - Can't snap	Interactive element	

TUTORIAL

Tutorial are display on 3D monitor.

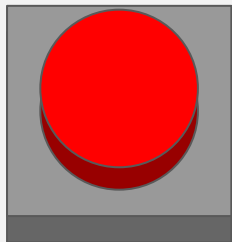
The tutorial is composed of several parts :

- Tear out the arms,
- Throw and move arms,
- Activate mechanisms,
- Introduction of the cameras and the tablets.



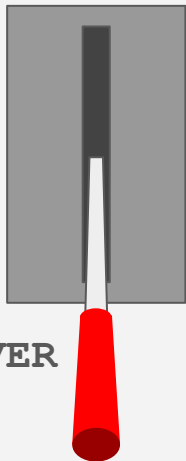
TUTORIAL MONITOR EXAMPLE

INTERACTIVE BRICKS

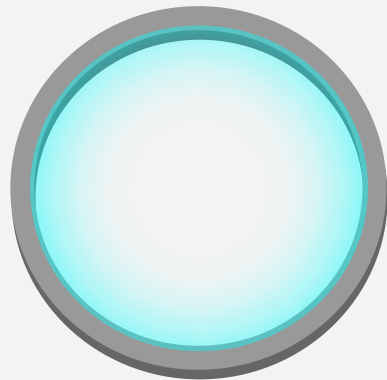


BUTTON

(pressure plates)



LEVER



HOOP

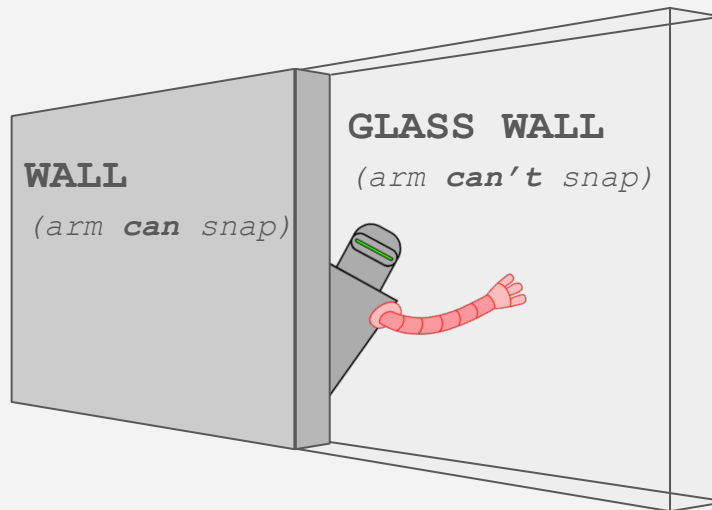
*(activate when an
object is throw in)*

PUSH ALL BUTTONS TO COMPLETED :

BUTTON 0/5

DISPLAY PANEL

(to see room objective)



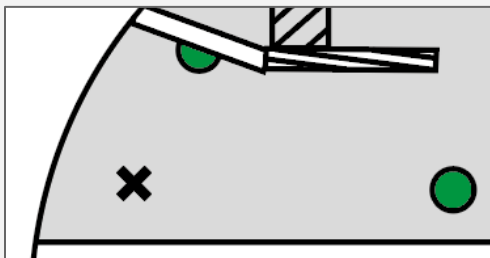
GLASS WALL

*(arm **can't** snap)*

WALL

*(arm **can** snap)*

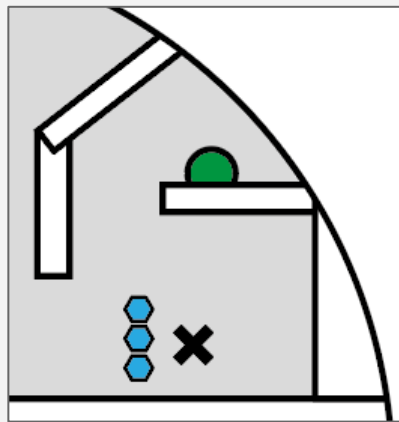
WALKTHROUGH



When I appear in the room I see a display on the wall that show the tutorial to dismantle one of your arms. It also shows the throw input. Across the room, I see one switch and one pressure plate that I need to activate.

I take one of my robot arms and throw it toward the wall. It snaps on the wall next to the closer switch. Now, I can move it from a distance and I use it to pull the lever.

The second is too far to reach it with one throw. I place one arm on the ground the farthest I can. Then, I use it as a relay to throw a third arm next to the pressure plate. I activate it and move onto the next situation.

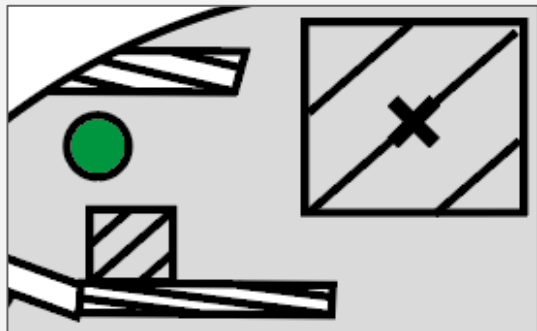


Next to me are placed three cameras and three black tablets. I catch one of the cameras, realize it has physics, and throw it on a wall. When the camera snaps on the wall, one of the tablets activates and displays the point of view of the camera. Now, I see the switch behind the wall. I place one arm in order to relay the second on the switch with the help of the camera's view. I activate it and move to the next situation.

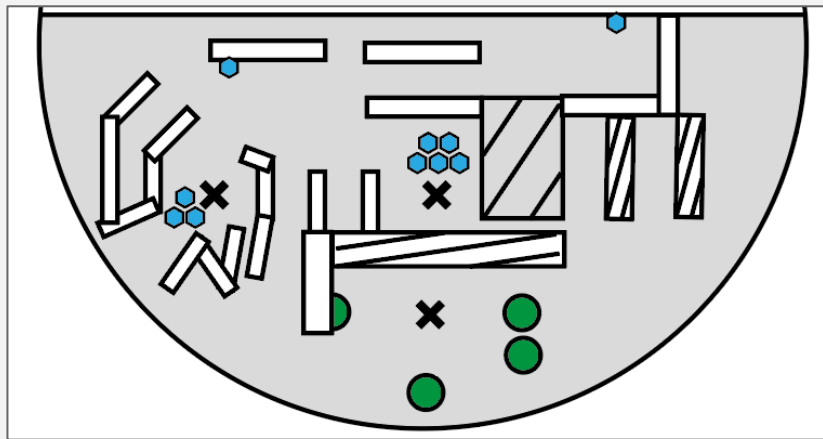
Legende:

Ground/Ceiling	Ground/Ceiling - Can't snap	Player spawn	Camera link to monitor
Wall	Glass Wall - Cant' snap	Interactive element	

WALKTHROUGH



When I appear in the zone. I see a lot of glass surfaces around me. I try to throw an arm at them only to realize it doesn't snap to it. I can now use this knowledge to activate the switch that I see in front of me and pass to the next zone.



This place is a large testing area with several spawn points and stress tests. They are designed to try complex and demanding situations in order to try freely the game mechanics.

Legende :

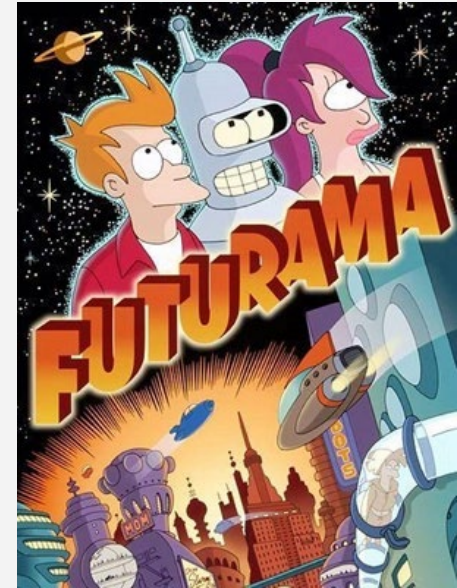
Ground/Ceiling	Ground/Ceiling - Can't snap	Player spawn	Camera link to monitor
Wall	Glass Wall - Cant' snap	Interactive element	

REFERENCES



PORTAL - Valve (2007)

As Physical Puzzle and ambiance reference



FUTURAMA - Matt Groening (1999-2013)

As humour and universe reference



THANK YOU
FOR READING

Sandwich Team

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