

# Haptic Module

~Bringing the Outside to You

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# Genre

Rapid Prototype project

Compact design

Easy to transport

Moduler

VR compatible



# Project Overview

Haptic feedback system to be implemented alongside a Virtual Reality Headset

Modular system, allowing users to connect multiple feedback modules

Variable strength feedback



# Developers

Tom: Technical Lead / Lead Programmer

Virtual Experience Creation / Game Design and Development within Unity

Asset Creation with Photoshop CC and Blender

Ben: Hardware Lead

Arduino Uno for Motor Control



# Usability

Maze escape

Players will be required to navigate without vision

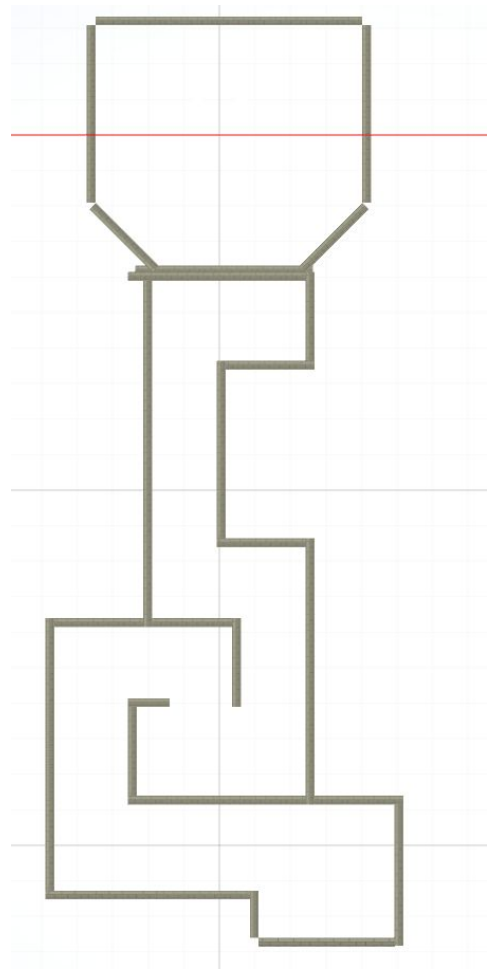
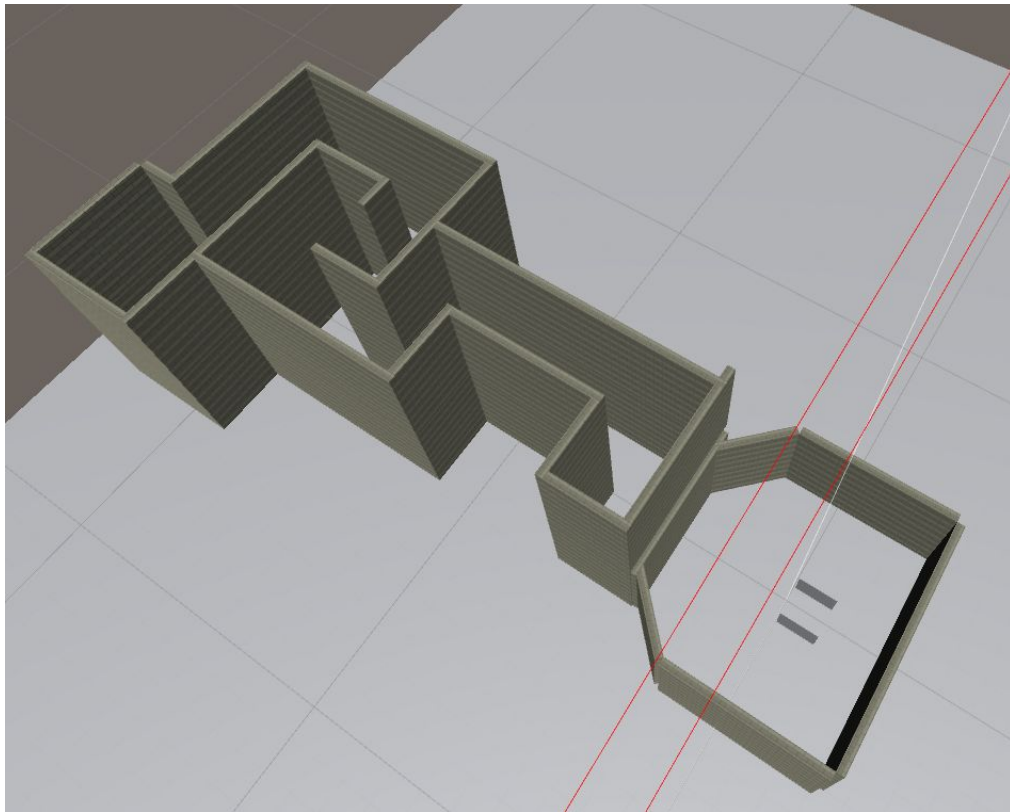
Rumble feedback used to provide environmental feedback in order to navigate the maze

Two types of motors being using (Dual Shock 3/Xbox Rumble motors and Coin Cell Vibration motors)

Goal is to find which motors provide a more natural experience



# Map Design





# Prototype Device

Uses an Arduino Uno

Two modules (Left Arm and Right Arm)

Uses two Xbox 360 Rumble motors for the Right Arm

Uses a Coin cell Vibration motor for the Left Arm (Final design will use three)

Variable size due to adjustable strapping





# Progress Update / Planned Features

Implement VR movement + controls (Headset tracking already implemented)

Design and implement a new, polished “experience” to compliment the device

Implement optional Leap Motion tracking

