

STRIKE&SHINE

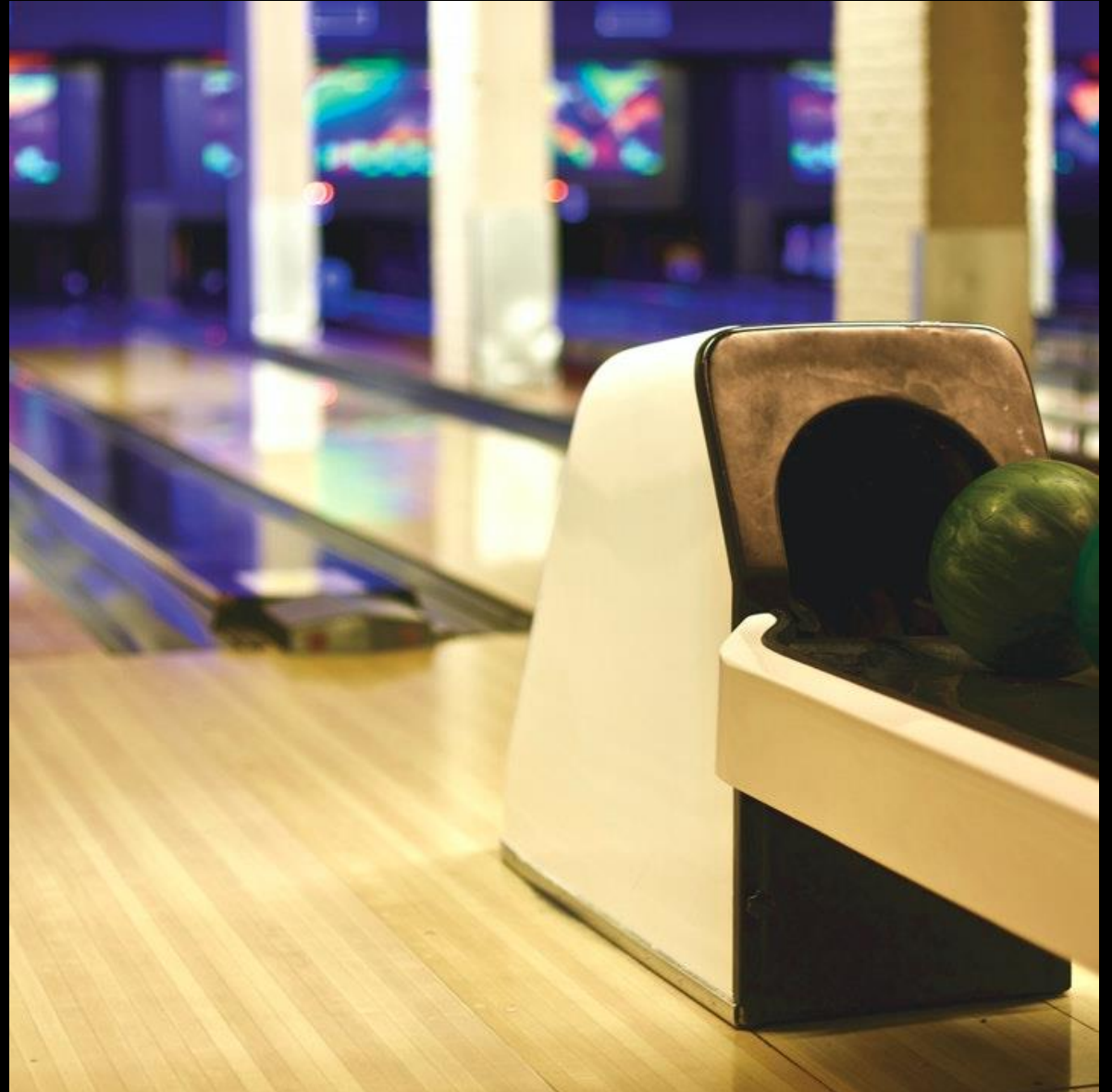
Merging Digital Entertainment
with Real-World Interactivity

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OBJECTIVES



Use
Unity



Use Virtual
Reality



Interact with
external
lamp

OCULUS QUEST 2

The Oculus Quest 2 is a wireless and standalone virtual reality headset by Meta, offering high-resolution displays and intuitive hand tracking for immersive gaming and social interactions.



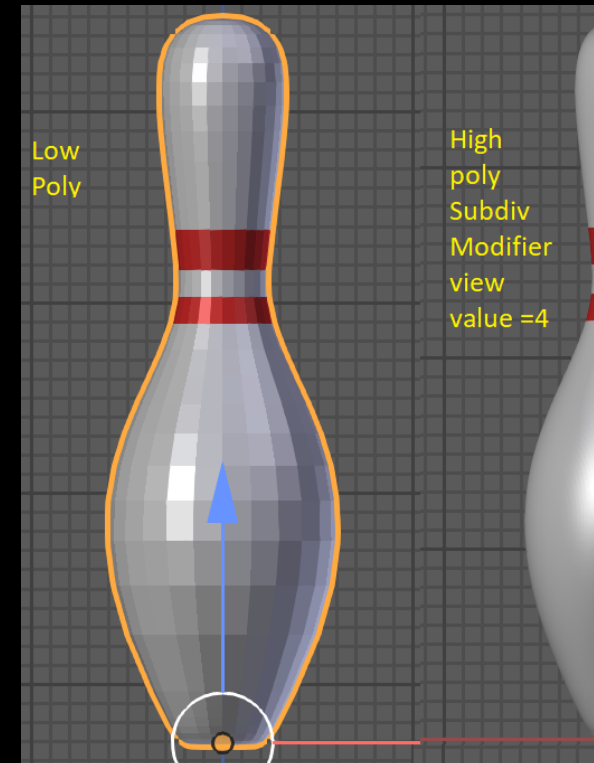
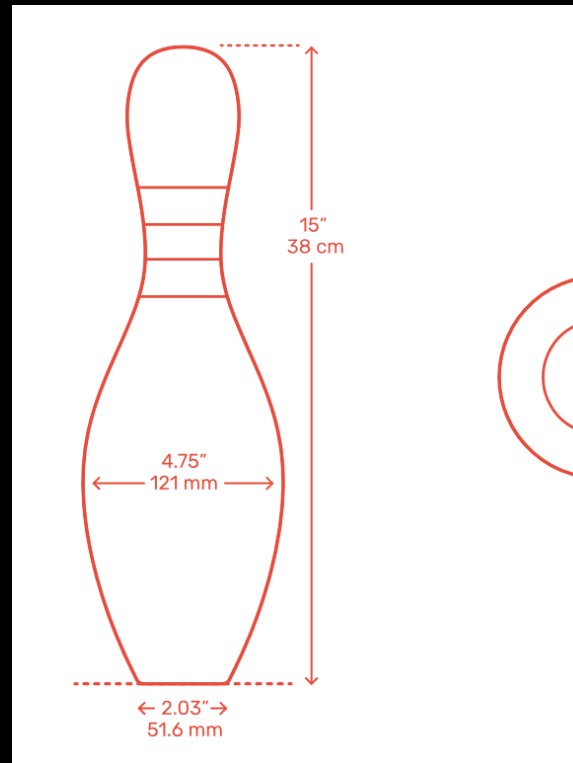
UNITY

Unity empowers developers to create games and content for the Oculus Quest 2, providing them with the necessary tools and resources to design immersive virtual reality experiences on the headset.



BLENDER

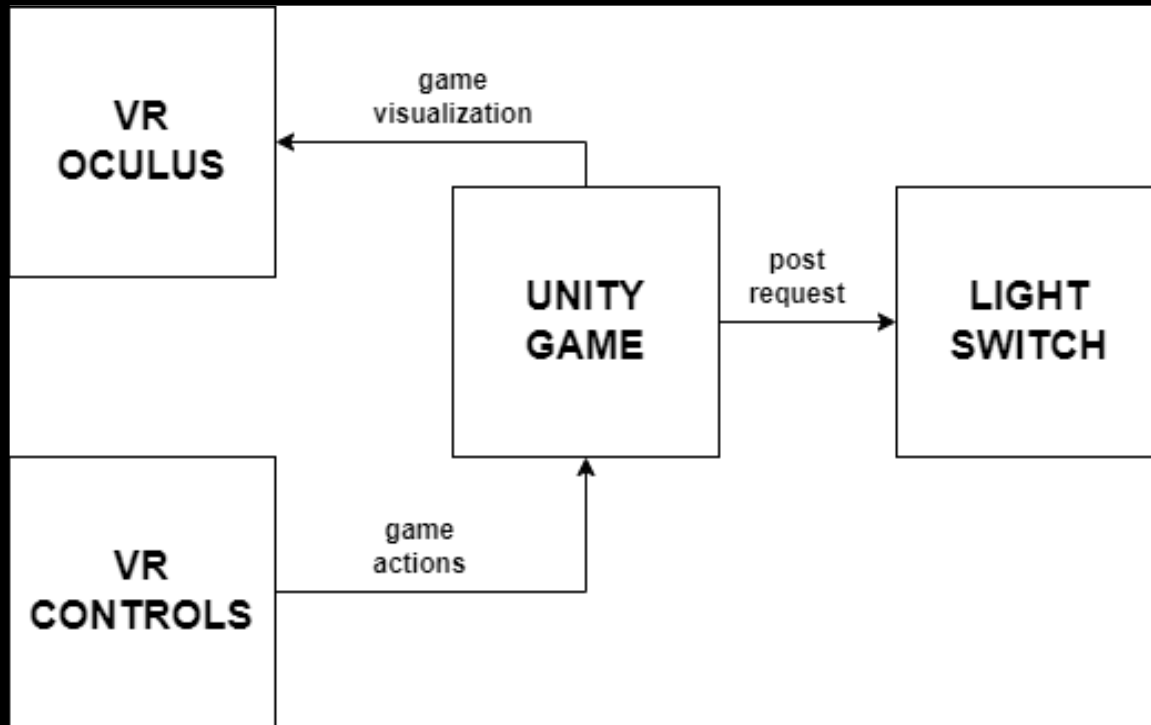
Blender is a versatile and free 3D computer graphics software that allows users to produce animated films, visual effects, artwork, and interactive 3D applications.



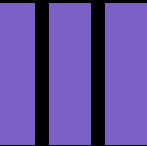
SONOFF SWITCH

The Sonoff Switch is a WiFi-enabled smart device that enables users to control their electronic appliances remotely using simple HTTP requests

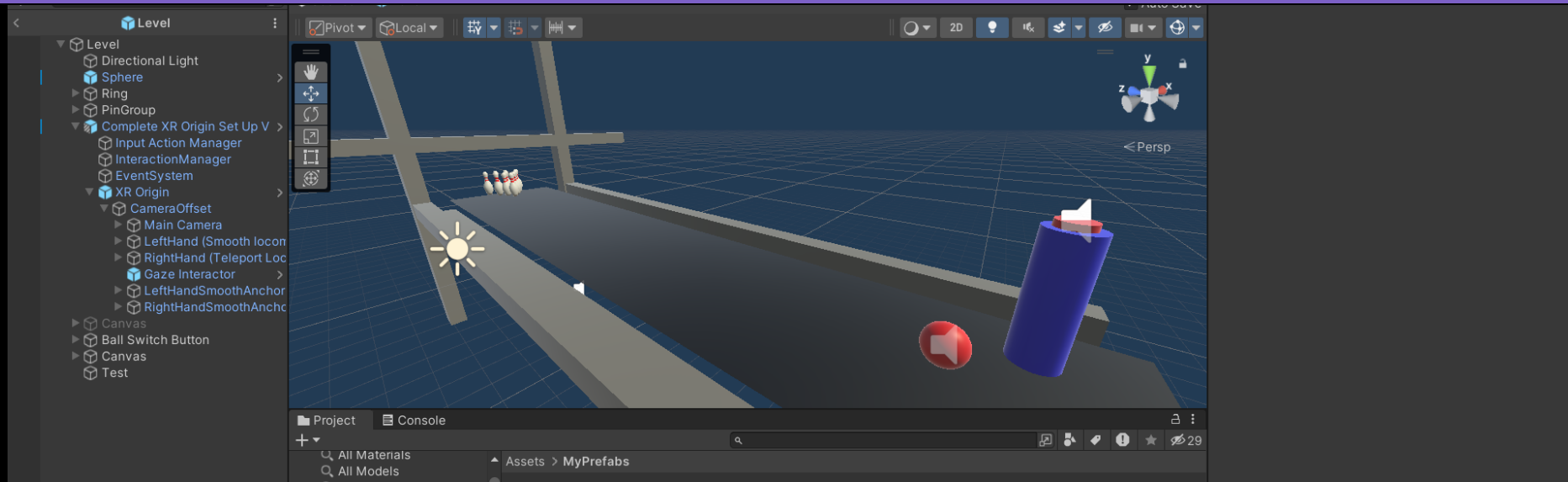




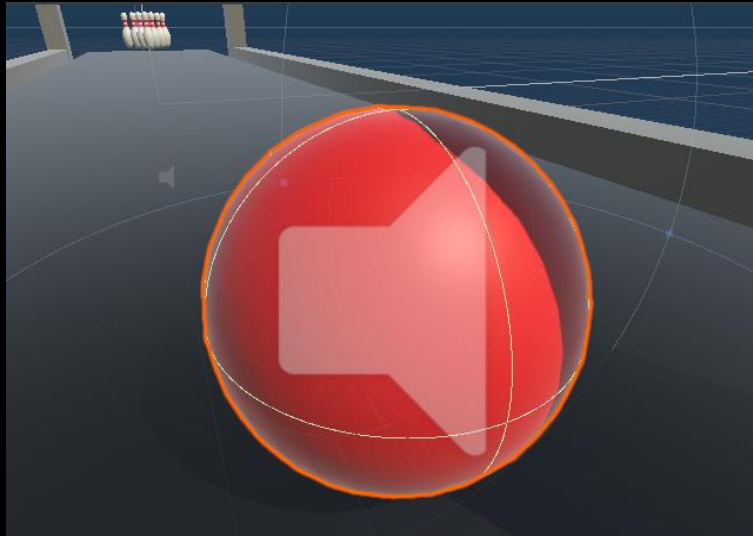
SYSTEM OVERVIEW



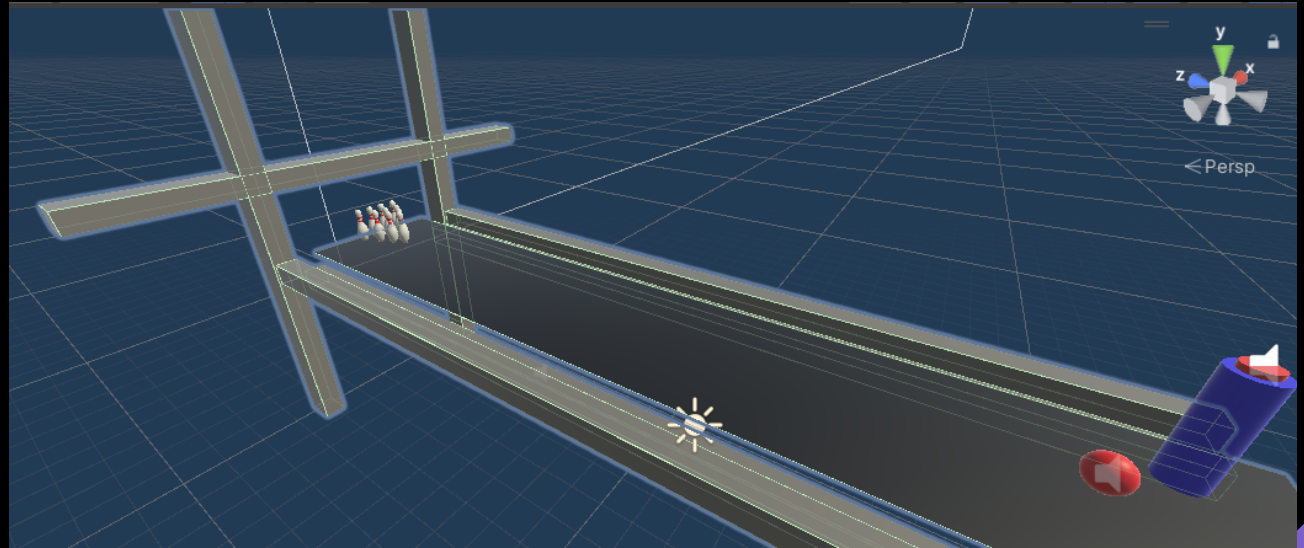
GAME ENVIRONMENT



- Simple Bowling alley;
- Button to switch the ball (different color/weight);
- Score counter (increases after all pins are knocked down);
- Audio: ball dropping, pins knock out, applauses

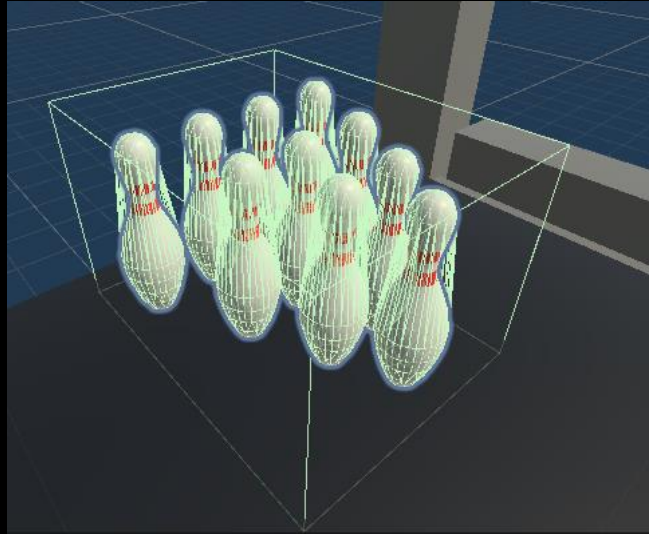


Bowling Ball

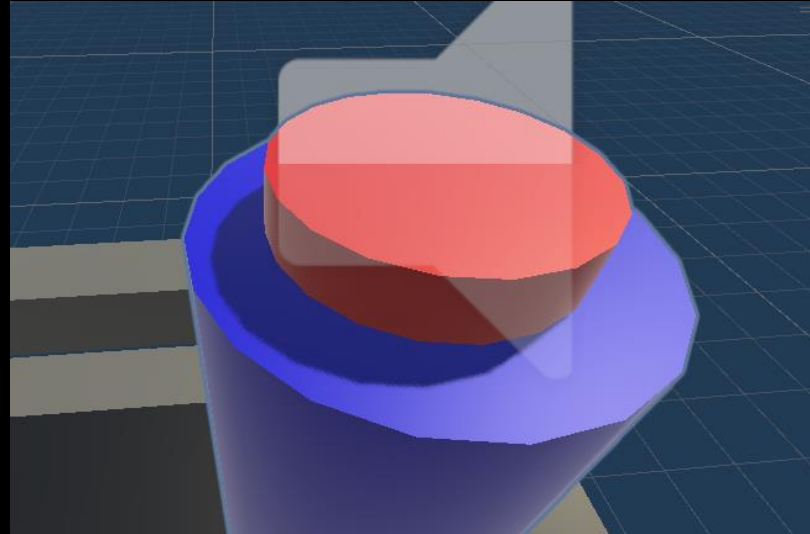


Bowling alley

UNITY GAME OBJECTS



Bowling Pins
Game Object



Ball Switch Button

UNITY GAME OBJECTS



FUTURE WORK

- Add manual respawn;
- Use better audio features;
- Improve the physics when throwing the ball;
- Implement Menu;
- Implement multiple game levels;
- Fix bugs:
 - Ball respawn velocity bug;

