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Title of Experiment: Demonstration of the working of HTC Vive / Google Cardboard / Google Daydream / Samsung gear VR.

Objective of Experiment: The objective is to explain users about VR headsets (HTC Vive, Google Cardboard, Google Daydream, Samsung Gear VR), highlight their features, enable hands – on experience, demonstrate available content, offer setup guidance, and promote VR's potential applications.

Outcome of Experiment: Thus, we Demonstrated the working of Google Cardboard and Made our first VR Application.

Problem Statement: Develop a basic VR experience in order to learn how to use VR in unity using Google Cardboard.

Description / Theory:

Virtual Reality (VR) is a technology that creates immersive, computer – generated environments or simulations. It typically involves the use of specialized headsets or goggles that track the movement of the user's head and display 3D visuals and surround sound, allowing users to feel like they're inside a virtual world. VR can be used for gaming, training, education, therapy, and more, offering a unique and highly interactive experience.



Features:

- **Immersive Experience:** VR provides an unparalleled level of immersion, making users feel like they're truly part of the virtual world.
- **Entertainment:** VR gaming and experiences offer new forms of entertainment, pushing the boundaries of traditional gaming and storytelling.
- **Training and Education:** VR is used for realistic training simulations in fields like medicine, aviation, and the military. It's also valuable in education, bringing complex subjects to life.
- **Therapeutic Applications:** VR can be used for therapy, treating conditions like post – traumatic stress disorder (PTSD) and phobias.
- **Architectural Visualization:** In architecture and design, VR allows clients to experience buildings and spaces before construction begins.

VR & Unity:

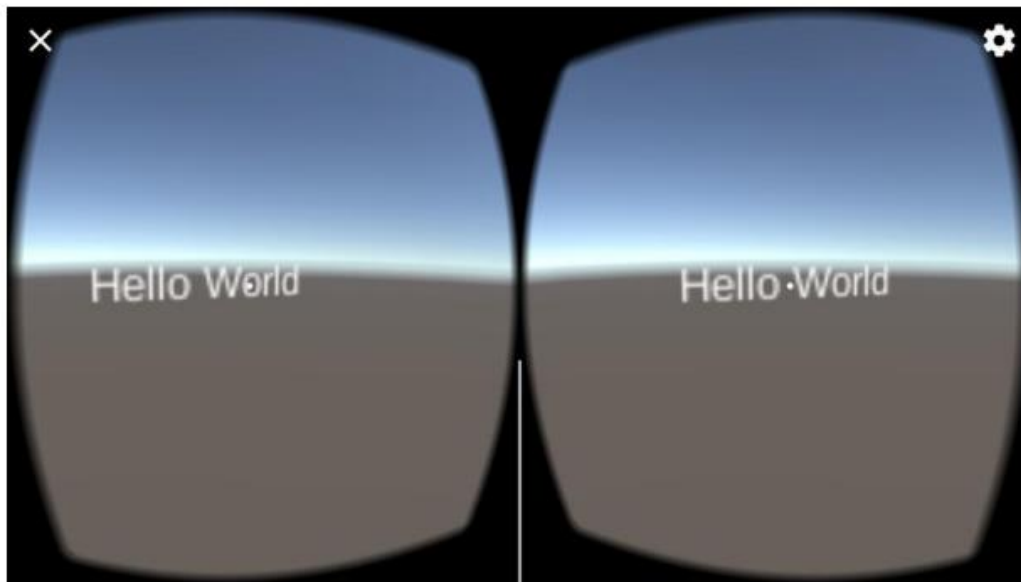
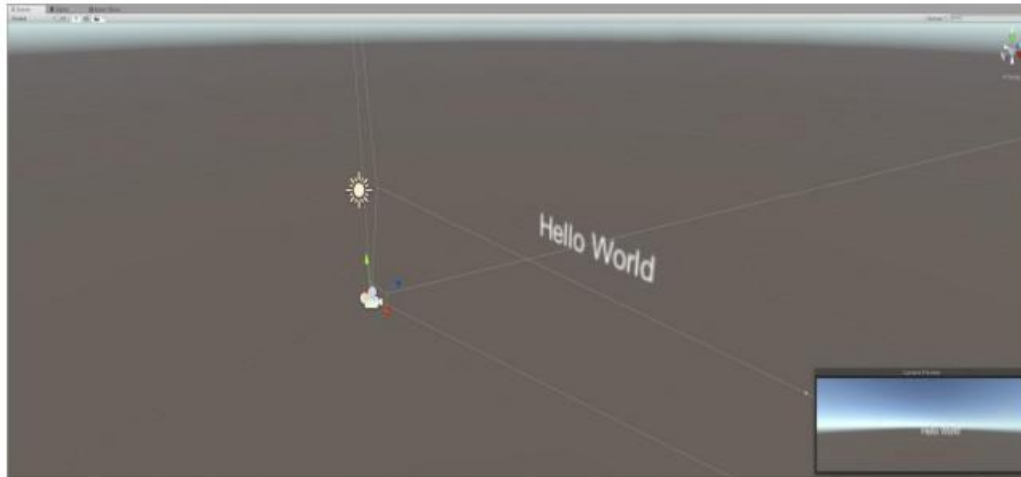
Unity is a popular game development engine and platform that is frequently used to create VR applications. Unity offers a range of tools and resources specifically designed for VR development. It supports various VR headsets, making it accessible to developers interested in creating VR content. Unity provides the necessary framework for rendering 3D environments, tracking user movements, and integrating interactive elements to build immersive VR experiences.

Google Cardboard:

Google Cardboard is a cost-effective and accessible VR platform developed by Google. It's not as advanced as high-end VR systems, but it's a great entry point for experiencing virtual reality using a smartphone. Google Cardboard consists of a cardboard viewer that you assemble, into which you insert your smartphone. There are numerous VR apps and experiences available for Cardboard on the Google Play Store and the Apple App Store. While it offers a more limited VR experience compared to high-end devices, it's an excellent introduction to the world of virtual reality and allows a wide range of people to enjoy basic VR content.



Output:



Results and Discussions:

After setting up Unity with the Google Cardboard plugin, configuring the project and player settings, and connecting your phone via USB debugging, you successfully displayed the VR output on your phone.

This process provides an introductory experience in creating VR applications. It's a crucial foundation for further development, customization, and the creation of immersive VR content using Google Cardboard and Unity.



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