≡ Item Navigation

The similarities and differences between AR and VR

Now that you've gained a basic understanding of what augmented reality is, it's important to understand how it differs from VR.

The most obvious difference is in the hardware itself. A VR experience must be viewed in some kind of headset, whether it's powered by a smartphone or connected to a high-end PC. VR headsets require powerful, low-latency displays capable of projecting complete digital worlds without dropping a frame. AR technology does not share this requirement. You can hold up your phone and have a headset-free AR experience any time.

Augmented reality is direct or indirect live view of a physical, real-world environment whose elements are "augmented" by computer-generated perceptual information. Virtual reality is the use of computer technology to create a simulated environment, placing the user inside an experience.

Both technologies enable us to experience computing more like we experience the real world; they make computing work more like we do in regular life-- in a 3D space. In terms of how the two technologies are used, think of it like this. VR transports you to a new experience. You don't just get to see a place, you feel what it's like to be there. AR brings computing into your world, letting you interact with digital objects and information in your environment.

Generally speaking, this difference makes AR a better medium for day-to-day applications, because users don't have to shut out the world to engage with them.

