

# The Dangers of VR

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Virtual Reality (VR) is the future – or so VR enthusiasts have lauded it for the past few years. Potentially, VR can change not just the way we play and entertain ourselves, but also how we learn, and how some of us work. Virtual Reality can open new doors and new realms of experiences, and even enhance how we view the world.

But that is the future and this is now. Far from the bleeding edge technology that press releases have framed it to be, virtual reality is still a technology-in-progress. The promises are still unrealized – not fully, anyway. And there are still a lot of bugs and kinks to iron out before the technology itself becomes mainstream the way smartphones have become.

If you have a new VR device or are planning on getting one, here are a few dangers you should watch out for:

## HEAD PROBLEMS

VR devices need to be strapped securely on the user's face in order to be effective. Since you'll move around and your field of view needs to be consistent with your orientation, it is important that the device stays in place. Naturally, this could put some strain on the user's face.

But the more important concern is the additional pressure that user's neck would have to bear. VR devices (or any gadget you wear on your head – glasses, headphones, etc.) need to weigh less than 4 ounces or it could become uncomfortable after wearing them for a prolonged time.

## EAR DAMAGE

"Complete immersion" isn't limited to what you can see, it's also what you hear. We've long known that prolonged exposure to loud sounds damage our ears. When you're completely lost in awe over a virtual world, you might not notice that you've spent hours with battle horns directly blasting in your ear.

## GROWTH RISKS

Having children use VR tech can present its own unique concerns. Will it affect the development of their eyes and ears? How about their balance? Their proprioceptive awareness? Can it affect the development of their young brains? These questions aren't unreasonable, given that actual experiences do affect how our neurons function. Since there is still no well-established data to assure us that a tech that alters our perception of reality won't do us long-term harm, it seems sensible to limit the exposure of children to such technology.

## VR SICKNESS

VR Sickness – a catchall phrase for the eyestrain, headaches, and even nausea that VR users report experiencing – is a real thing.

With VR, we are basically tricking our brains into seeing something very near our eyes into something that's far away. Coupled with the usual flickers and objects moving too fast or too slow, and you may find your clothes (or your furniture or your carpet) barfed on.

## EYE COMPLICATIONS

You know how your mother warned you time and again that your eyesight would get worse if you don't move away from the TV while watching? While that belief has been largely debunked, eye experts are wary about how extended use of virtual reality can affect the eye. Specifically, whether it could result to increased chances of having myopia (nearsightedness).

Oculus says that you should have a "10 to 15 minute break every 30 minutes, even if you don't think you need it" but I wonder how many would follow this, given that VR devices strive to provide immersive experiences. In truth, even Oculus' tip is basically a gut-feel. We don't have the science yet to make a call on what VR safe usage would be.

## BLIND MAN WALKING

Some people would say that covering your eyes and then doing all sorts of movements is a mishap waiting to happen and they would be right. If you're wearing VR tech, make sure that there are no children or pets around. Your arm swings and hand gestures – frantic as they are when you're trying to win a game – would hurt just as much if you're trying to hit another person purposely. If you have a spare room cleared of all obstructions, do your VR there. It's less dangerous, although I honestly can't say it's 'safe' as it is. That's because even if no one else is in the room, you can also end up hitting yourself. Since your eyes are fully covered, some people lose their orientation of self with regard to their arms and the gadgets they're holding. Also, remember that what you're seeing on your headset doesn't represent the actual length and width of your arms so at times, self-harm would be unavoidable.

And we haven't even talked about cables. Premium VR devices typically come attached with a cable; a man walking around an empty room with his eyes covered can easily end up tripping on his own feet or to the cables trailing behind him. It has happened before. You can reasonably expect it to happen again. If you're playing in your living room, the danger also extends to everything around you. It might just happen that you punch a real wall instead of a virtual one. And don't even get me started on your beloved 4K TV. If you're doing VR, it might be a good idea that you have a buddy watching over you, ready to shout out a warning.

Virtual Reality is exciting, but its heyday still lies in the future so our information about its longstanding effects are still scant and unverified. If you're planning to get in on the fun, make sure that you have a safe space to use and that you limit your usage appropriately.