Google Glass: Potential Benefits And Security Concerns

Abenaa A Asare

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George Mason University

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Introduction

In a world that is constantly being modified by technology. Computer technology has evolved dramatically over the years and has significantly changed the way our society interacts. Google glass, also project glass, is a wearable computer made my Google. This essay will analyze some of the potential benefits of a wearable computer, social and ethical issues, as well as security and privacy aspect of the technology. Welcome to a world through Glass.

Background

Google glass a wearable computer that is made in the shape of glasses. It has a microphone, cameral and a tiny heads up display. The first generation of the glasses is capable of recording audio, video and photos. According to one website found online, all data recorded by Glass, including photos, videos, audio, location data, and user data, is stored in the cloud on Google's servers. Glass can connect to the Internet via wifi, or tether to the user's Smartphone. Even when offline, Google Glass can record pictures and video from anywhere the owner wears the device. According to a news report on Glass by Paul Miller, Glass model is one of a “timeline” full of “cards. Each card, when tapped, can reveal more cards or present actions like “delete” or “reply”. Some cards can be “pinned” which places them to the left of the home screen. Otherwise, cards are sorted “chronologically to the right of the home screen. While Glass’ best known interaction method is the verbal “okay, Glass” prompt, most of the UI can only be operated by swipes and taps. Outside of the home screen, the only time you will be speaking is when your composing a reply to card in your timeline like a tweet- (Miller, 2013., para 3). Glass’ screen is, as its name might imply, transparent. When it’s active, not only can
people see the glow of the display through the glass—they can actually make out exactly what you’re doing if they look closely enough”-(Oremus, May 2013, 8., para 7).

Benefits of Google Glass

During the research, I came across a website called EPIC (Electronic Privacy Information Center). In their article “Google Glass and Privacy” the author mentioned that the Glass camera sees whatever the wearer sees. It can use GPS for location-tracking and directions. Glass can also connect to a Smartphone to make phone calls, send text messages, and read emails. The device is controlled by the wearer's voice and gestures. Users can talk or tap Glass to initiate searches and execute functions. Google will allow developers to create apps to enable additional functions. One developer has already created an app to take pictures surreptitiously by winking. To an observer, it is difficult to know whether Glass is recording the environment or not. In a YouTube video called Implications of Google Glass Evgeny Morozov, author of “To See Everything Click Here” states that the Google Glass is able to recognize and manipulate things around us. For example, if a person who had eating a lot of fattening food decided to go to restaurant, the Google Glass would be able to block out all the food with high fat contents so the wearer could choose the healthier options. This is obviously a great idea for society and could be extremely beneficial in lowering obesity in the United States. There are many other great benefits of the Glass, hence why it cost nearly $1,500. However it isn’t being sold to the public just yet. It is only been given as free trials for developers to develop their own apps and modify the device as they please.
Security & Privacy Concerns

According research done by Electronic Privacy Information Concern, wearable computers threaten non-users with "always on" surveillance. For example, if a person walks into a bar wearing Google Glass, other patrons may not be able to tell whether that person's Glass is recording their actions and conversations. Even if Glass is not actively recording, third-parties must react to the device as if it might be recording at all times. This threatens the ability of individuals to have private, candid, or anonymous social interactions. People cannot let down their guard or lower their veneer of professionalism; for fear that their actions may be recorded, spread and criticized out of context. All of the data captured by Glass, including photos, videos, audio, location data, and other sensitive personal information, is stored on Google's cloud servers. Google will possess the data and may analyze it to develop profiles of individuals. Women are frequently subjected to harassment or shaming based on their appearance and behavior. Glass worsens these risks. The Google Glass gives stalkers, harassers, and creepers the ability to take invasive photos of women in public without their knowledge. If such a person were wearing Glass, they would be able to secretly take photos and videos of women's bodies with a low risk of getting caught. This could include taking photos down women's shirts, up their skirts or dresses, or while sunbathing at the beach or pool. These images can then be distributed over the Internet. Being able to sneak a photo with Google Glass heightens the risk to women's privacy and public safety.
Legal and Ethical Issues

There is a lot of confusion on whether surveillance is ethical or not. As I was reading the sources used in this research, I began to question to what extent is ethical to create records of the lives of others without prior consent or cognizance? Wearable devices create moral and ethical challenges, especially if they are widely used. The more data that is generated about family’s, peers and even strangers, the greater the potential risk of harm to us and others. While the Glass user may have made the conscious choice to trade his privacy for the use of his new gadget, the people captured by the Glass camera have not. Google Glass invades their privacy and anonymity without their consent. Law enforcement and government agencies may also obtain access to the data recorded by wearable computers such as Glass. Because wearable computers will capture a large volume of "always on" data, the data will be highly sought after by law enforcement. It is essential that adequate legislative and judicial safeguards are instituted to ensure that government agents cannot access these data without oversight, transparency, and accountability. Probable cause warrants should be required for all data collected by Glass, regardless of whether the data is possessed by the user or Google.

Social Concerns

Because of the invasiveness of Glass, some venues may choose to ban its use. Google Glass, and similar wearable computing devices, imposes special threats to women's rights and privacy in particular. The device does not just allow the wearer to record and observe other people, but Google as well. Right now, concerns over individuals’ privacy have caused a number of places to “pre-ban” its use. The author of “Is Google Glass A Passing Fancy” states that “According to an article in Search Engine Journal, ten types of places have already
banned Google Glass. Bars, Casinos, Classrooms, hospitals, movie theaters, locker rooms, strip clubs, Banks and ATMs are all among many others”-(Gilman, 2013., para 12). This explains that although the Google Glass is a very value technology as a result of its recording capabilities, it might not be able to gain a lot of acceptances in many social places. Which then makes me question if many of these social places are concerned about its invasion of privacy, then where and how can the Google Glass be used?

Conclusion

Google Glass is very interesting technology and I am very grateful to have had the opportunity to do research on it. The device has many benefits such as providing directions without having to constantly look at the GPS, recording videos and pictures from a wink of an eye, and many cools apps that are in the process of development. The Glass however also have many disadvantages and raises a lot of privacy issues and social concerns. It invades people’s privacy without their permission. Google stores information that people record on their cloud. It has been morally and ethically questioned by much people and law enforcement. Though the product is not being sold to the public yet, it seems very unlikely that it will have a high successful rate of purchase; considering the fact that the device cost a lot of money and has already been banned from many social gatherings. The development of technology may give arisen as time and years progress. Some technologies may be highly more accepted than others. But many others like Google Glass may just not have a successful rate. I could be wrong, only time can tell when the device finally goes out for the public to purchase.

This was a short video of Evgeny Morozov author of “To See Everything Click Here” speaking about the potential benefits of the Google glass. It was beneficial because it gives more information about the benefits of the Google Glass other than the simple fact that it has interesting apps.


This was an interesting Trade Journal that talked about the dismissiveness of the Google Glass. Many Places have already banned the use of the devices because they believe that it invade individual privacy.


Great and reliable website, it gives great information of glass. The information is broke into different junks and has been condensed for better understand of Glass. They also give reference to other scholarly journals, news reports and thing resources to learn more about Google Glass.

Michael, K., & Michael, M. (2013). No Limits to Watching?. Communications Of The ACM,
This was a good article, although it was short in length, it posed some very good questions about wearable computers. How ethically right are they and the fact that although they are good, they can also pose some serious consequences not only to ourselves but others around us.


This was a good and reliable news report source. It gave a lot of information about some of the basics of the Google Glass. As well as build-in apps that are available on the device, some third party apps. Lastly, it gave information about hacks that could potentially happen of the device.


It was a great and reply article on some of the negative aspect of the Google Glass. It allows you to analyze and compare both the good with the bad. It talks about how the Google Glass makes it really obvious to know if someone is invading your privacy or not.