July, 2014

Google Glass in Education

Sivakumar R

Available at: https://works.bepress.com/sivakumar/1/
GOOGLE GLASS IN EDUCATION

Dr. R. Sivakumar

Abstract

Google Glass increases the flexibility of delivery of education so that learners can access knowledge anytime and from anywhere. It can influence the way students are taught and how they learn as now the processes are learner driven and not by teachers. This in turn would better prepare the learners for lifelong learning as well as to improve the quality of learning.

INTRODUCTION

Innovations in education has always been a little stagnant, while we see new inventions and developments in all other fields, educational innovations are very less. People have always stuck with the known, tried, tested and traditional methods in case of education. But recently, we’ve seen a boom in this field too. More and more people are now paying attention to the almost obsolete methods of teaching and striving to make some development in the educational system.

GOOGLE GLASS

Google Glass is a small device tacked onto a pair of glasses. Google Glass lets you record what you’re seeing, view a heads-up display of information and has a touch pad on the right side of the glasses. That touch screen is one of the ways you control your pair of Glass. The other way is by verbal commands like “OK Glass” and that sort of thing. Google has always been known for innovations in almost every area they could get their hands onto, and it is launching its flagship product ‘Google Glass’. Google Glass is touted as the next big thing in portable technology. Poised as an eyewear and doing a plethora of things which don’t require any taps or navigation, it responds instead to voice commands, taking pictures with a wink, taking commands for search, share content, video recording, detect objects in front of you and look up related information like directions or maps. etc. The possibilities are endless though among all the possible consumers of Google Glass, the device has the potential to bring exciting new possibilities to teachers and students alike.

The Potential of Google Glass

A little more about the technology: Glass is a wearable computer, worn on the head like a pair of glasses and operated through voice commands and touch. The screen sits above the right eye within a transparent plastic enclosure. Also attached to this device are a camera for taking photos and video, and an earpiece that records your voice and transmits audio through the skull. Additionally, the device allows for easy sharing of videos and photos via Google+, Tumblr, Face book, and Twitter. The user can also send voice-to-text instant messages and emails, as well as send or receive phone calls. The device accesses the network via Wi-Fi or by setting up a personal hotspot on Androids and iPhones.

GOOGLE GLASS IN EDUCATION

---

Assistant Professor, Education Wing – DDE, Annamalai University
Google Glass has the potential to bring new possibilities to educators and students. Probably, Google Glass is a new educational tool that allows using actions, such as “Search”, ”Take a picture”, ”Record a video”, ”Translate” and other for integrating into teaching and learning activities. Successful implementation of new technology in education depends on many circumstances. We need to understand how Google Glass can change teaching and learning. Google Glass will allow the student / teacher to stay connected to an interactive environment featuring online tools all the time. This could pave way to a leap into the future of educational system.

- Teachers as well as students can refer to topics related to their studies on the go. No fiddling through phones in the middle of the lecture.
- Students can record their lectures in real-time for future reference. The time saved on scribbling notes could be remarkable.
- Google Glass can help students to create visually rich presentations. Students can shoot relevant videos and images with a wink. The same can be integrated onto their presentations via Google docs.
- Learning new languages and speaking them can be done on the go with Glass coupled with Google’s own Google Translator. Google Glass will be able to present text based translations in real-time.
- Teachers can use Google glass coupled with facial recognition to take attendance and can be used to generate Student Information System. Just by looking at the student you will get access to his/her student records with details of academic and non-academic performance, attendance etc. Creating students reports, schedules and class timings for students is only the tip of the iceberg.
- Distance learning can be made a lot easier than before with Google Glass. Webinars and such can be streamed directly onto your Glass than your smart phone or laptop so that it is easy to be accessed anywhere, anytime.
- This Glass can be used to set timetables for students along with information regarding the halls where classes will be held with details on professors to take the classes.
- They're capturing videos and images of classroom activities through a small camera built into Glass' frame, and sharing them online. They use Glass to teach lessons from their perspective to share with others, or for their own reference. They're propping the glasses on students, and using the footage and images from young people to understand what they see and how they learn.
- Even more common, educators broadcast from inside the classroom, leading science labs, group discussions or even performing surgery for remote audiences. They show it in real time through Google+ hangouts and as videos shared later through YouTube, personal blogs and other forms of social media.

IMPROVING CLASSROOM INSTRUCTION

- Teachers can record and observe their own teaching practices.
- Create mini-documentaries to enhance storytelling in the classroom.
- Capture science in everyday life via photos, videos, audio and images and share with the class.
- Facial recognition to help teachers identify their students.
- Display detailed information on student’s academic positioning, allowing teachers to tailor lessons to students’ strengths and weaknesses.
- Lecture feedback system that lets a teacher know when students are falling behind.
- Group tutorial session like Google hangouts with teachers to clarify any points or questions that may have been missed or coordinate with teachers on homework.

ACCESS OF LEARNING RESOURCES

- Learn new languages using Google translator.
- Create timetables/schedules for teacher, lectures and students.
- Students can use Google Now for personalized search tailored to their personal learning needs.
- Access to teachers/specialists (or students) at a distance
- Remote teaching and one-to-one tutor sessions.
- Teachers can create real time connections with home-schooled and remote students taking education beyond the classroom.
- Interact with instructors and peers in a classroom setting via online learning.
- YouTube education for distance learning.
- Teachers can document a lesson to share with other teachers.
- Document and keep sharable records of lessons that require demonstrations and hands-on experience functionality.
- Record lessons from the teacher perspective and edit together with views from the student perspective as a tool for revision and reflection.
- Connect with other educators from different parts of the world via Google Hangout.
- Create a “Teacher View” online to watch a colleague’s lesson and offer suggestions in real time that appear in the teacher’s eye-line.

TEACHER OBSERVATION

- Teacher evaluations become less intimidating by removing the observer from the physical classroom.
- Teacher observers can easily incorporate short segments of video evidence in their feedback.

ACCESSIBILITY

- Provide accessibility for students and teachers with visual, auditory and physical handicaps.
- Have a specialist or behavioural expert observe children for signs of a learning disability as they work in their classroom with their teacher.
- Students and teacher who wear glasses can now enjoy easier and more accurate eye examinations in real time.
- Students who are reluctant to ask aloud in lectures can send questions via text SMS to Google Glass.

COMMUNICATE WITH STUDENTS’ PARENTS

- Send messages that contain important information to students’ parents such as test scores and report cards.
- Send short video and text message to parents.
GOOGLE GLASS IN EDUCATION: THE OTHER SIDE

While all this could be a boon in the education system, there are some cons of having Google Glasses at Schools / Colleges.

- You must keep in mind that electronic devices are still prohibited for students in most schools; though, this is changing very fast. Students could misuse the Glass in a lecture in ways unimaginable. The distractions a smartphone causes in a classroom are well known, students wearing Google Glass will bring about a whole new level of the same.
- This could also happen to Google Glass, being banned at all major concerns / colleges / universities.
- Not to mention a certain invasion of privacy.
- Like with any electronic device, prolonged usage of Google Glass can cause health issues mainly damaging eyesight.
- Lastly, too much use of social media and on the go availability may harm your personal life.

CONCLUSION

The adoption and use of Google Glass in education have a positive impact on teaching, learning, and research. Google Glass can affect the delivery of education and enable wider access to the same. In addition, it will increase flexibility so that learners can access the education regardless of time and geographical barriers. It can influence the way students are taught and how they learn. It would provide the rich environment and motivation for teaching learning process which seems to have a profound impact on the process of learning in education by offering new possibilities for learners and teachers.

REFERENCES


How Google Glass is going to Innovate Education Retrieved from http://foradian.com/post/49920105096/googleglass