Our Augmented Reality

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**Abstract**

Augmented reality is a mixed reality of technological framework that constitutes more than one reality as it manifests virtual objects within the real environment for users to enable the interaction with the virtual content. In the framework of cell phones AR, the technology is complemented with digital elements to the real-time with the smartphone camera. Pokemon GO is an explicit illustration of mobile AR. AR has yielded a potential range of advantages to humans in all walks of life. Medical, military, education, innovation, convenience and diseases are the prominent dimensions harnessing its potential. Similarly, the future of AR is bound to unleash tremendous incentives to humans and advance technology in true letter and spirits. The challenges faced by AR are also imperative to be highlighted amid these evolutions.

**Outline**

1. Thesis: Augmented reality is stipulated as a technology comprising three fundamental elements as the alignment of virtual and real objects with each other, a combination of virtual and real objects in a real environment and potential real-time interaction

a. The contemporary manifestations of the technology are widespread which are also used by the U.S. army to digitally improve the missions for soldiers

b. Today, augmented reality has manifested virtual objects within the real environment for the user to enable the interaction with the virtual content.

1. The Contemporary State of Applications in Augmented Reality
2. Military harnesses AR to help women and men as they can make repairs in the field
3. The medical professionals utilize it to prepare for operating surgeries
4. The image recognition technology and GPS are integrated to search for data from online databases
5. AR dominates and revolutionalizes the framework of gaming
6. A Critical Appraisal on the Future Implications
7. The advent of 5G data networks will enable the devices to receive and send a tremendous amount of data
8. Google and Apple are aiming their focus on utilizing AR in true letter and spirits

 4. Challenges for Augmented Reality

 a. The immense dependence on AR can cause people to overlook the essential things

 b. The touch of potential interaction will be replaced with a computer program

 C. The fundamental diversity is rooted in privacy concerns

1. Conclusion
2. AR is defining the state of technological affairs potentially
3. The productiveness of AR is yet to be unleashed

**Our Augmented Reality**

**Introduction**

Augmented Reality (AR) integrates the virtual and real words, supplementing real-world applications with computer-generated objects in the paradigm of real time. As per the widely recognized interpretation, AR is stipulated as a technology comprising three fundamental elements: alignment of virtual and real objects with each other, combination of virtual and real objects in a real environment and potential real-time interaction. Besides, it is a mixed reality of technological framework that constitutes more than one reality as it manifests virtual objects within the real environment for users to enable the interaction with the virtual content. In the framework of cell phones AR, the technology is complemented with digital elements to the real-time with the smartphone camera (Diegmann, Schmidt-Kraepelin, Eynden, & Basten, n.d.). Pokemon GO is an explicit illustration of mobile AR. In addition, the contemporary manifestations of the technology are widespread which are also used by the U.S. army to digitally improve the missions for soldiers. Headsets and wearable AR glasses assist them to process data at tremendous velocity. Similarly, the future of the technology is likely to be utilized by social media platforms, Google, educational institutes and assisting disabled persons.

**Discussion**

To begin, there exist a wide range of potential applications utilized because of the advent of AR. The early tablets and computers used the technology to produce games but its implications encompass a broader state of affairs. For instance, the military harnesses AR to help women and men as they can make repairs in the field. The medical professionals utilize it to prepare for operating surgeries. The educational and commercial applications are in thousands. The Heads-Up Display (HUD) is an explicit illustration of AR in the paradigm of military applications (evaluating & Technology, n.d.). The transparent display is positioned in the view of the fighter pilot. Altitude, horizon liner and airspeed are displayed to the pilot. It is also used in educational sectors as the medical students can harness it to practice surgery in a critically controlled environment. Neurosurgery is a prominent practice in this case. The surgeon is offered the flexibility to sketch the brain in 3D on top of the actual anatomy of the patient. Furthermore, the enhanced GPS systems make it a simple task to traverse toward a specific destination. With the assistance of smartphone's camera with GPS, users can see the particular route through a live view in the car. Another intriguing manifestation is sightseeing. The tourists can traverse the historic sites and view figures and facts presented on their live screens. The image recognition technology and GPS are integrated to search for data from online databases. AR dominates and revolutionalizes the framework of gaming. The computing power has transformed into the portable entity and head-worn systems have become affordable. Popular iOS and Android apps featuring AR comprise Pokemon Go, Zombies, Ghost Snap AR, SpecTrek and Temple Treasure Hunt.

 After deliberating the contemporary uses of AR, it is essential to offer a critical overview of the future implications of the technology. Several manufacturers are emphatic about the success of AR as building devices which accentuate AR experiences. The powerful tech giants, Google and Apple, are committed to incorporate specifications in the mobile devices to handle the requirements of specific AR software(“How Augmented Reality Works,” 2001). The fast processing units as iPad and iPhones and pertinent pocket-sized devices have accomplished the disposition to run data-intensive applications of diverse categories. In the future, the advent of 5G data networks will enable the devices to receive and send a tremendous amount of data to make AR even better and faster than before. In 2018, a corporation namely Brain Power advanced to sell Google Glass as a program to assist the persons with autism. It enhances their socials skills and rewards them for gradually learning to interact with their surroundings.

 However, it is imperative to highlight the challenges faced by AR in the future. For instance, people may not desire to rely on cell phones with small screens to superimpose data (Khan, Johnston, & Ophoff, 2019). The AR capable glasses and contact lenses and will offer users an expansive and convenient view of the world. Meanwhile, the immense dependence on AR can cause people to overlook the essential things in front of them. Instead of a seasoned tour guide, AR iPhone applications will take preference. The touch of potential interaction will be replaced with a computer program. Moreover, a real plaque on a building will be preferable to a virtual entity that will be accessible to people equipped with specific technologies. The fundamental diversity is rooted in privacy concerns. The integration of AR with image recognition software can equip people to point cell phones at others and immediately retrieve data from their Amazon or Facebook(Liberati, 2016). Despite these challenges, AR will revolutionalize the learning modes and utilization of technology in the future to aid humanity.

 **Conclusion**

The deliberated instances highlight the instrumental role assumed by AR in advancing the technology and offering widespread ease and flexibility in human operations. From assisting disabled persons to accelerating the operations in the military, AR has advanced to fill the lacunas. Irrefutably, AR has sketched a real-time picture of the theories and myths pertinent to technological evolution underpinned in the past decades. AR is a reality and its utilization is evident in every walk of life. In addition, the potential of AR is yet to be unleashed and consumed by humanity. The future holds significance to discern the challenges and productivity yielded by AR. The world is likely to be dominated, viewed and interpreted in the paradigm of AR by the successive generations. The bottom line is that AR manifests widespread benefits in the contemporary era and is likely to accelerate productivity in the near future.

**References**

Diegmann, P., Schmidt-Kraepelin, M., Eynden, S., & Basten, D. (n.d.). *Benefits of Augmented Reality in Educational Environments - A Systematic Literature Review*. 16.

evaluating, T. P. A. leader in information technology on the front line of, & Technology, I. N. (n.d.). All You Wanted to Know About Augmented Reality. Retrieved April 15, 2019, from Livewire website: https://www.lifewire.com/applications-of-augmented-reality-2495561

How Augmented Reality Works. (2001, February 19). Retrieved April 15, 2019, from HowStuffWorks website: https://computer.howstuffworks.com/augmented-reality.htm

Khan, T., Johnston, K., & Ophoff, J. (2019). The Impact of an Augmented Reality Application on Learning Motivation of Students [Research article]. https://doi.org/10.1155/2019/7208494

Liberati, N. (2016). Augmented reality and ubiquitous computing: The hidden potentialities of augmented reality. *AI & Society*, *31*(1), 17–28. https://doi.org/10.1007/s00146-014-0543-x